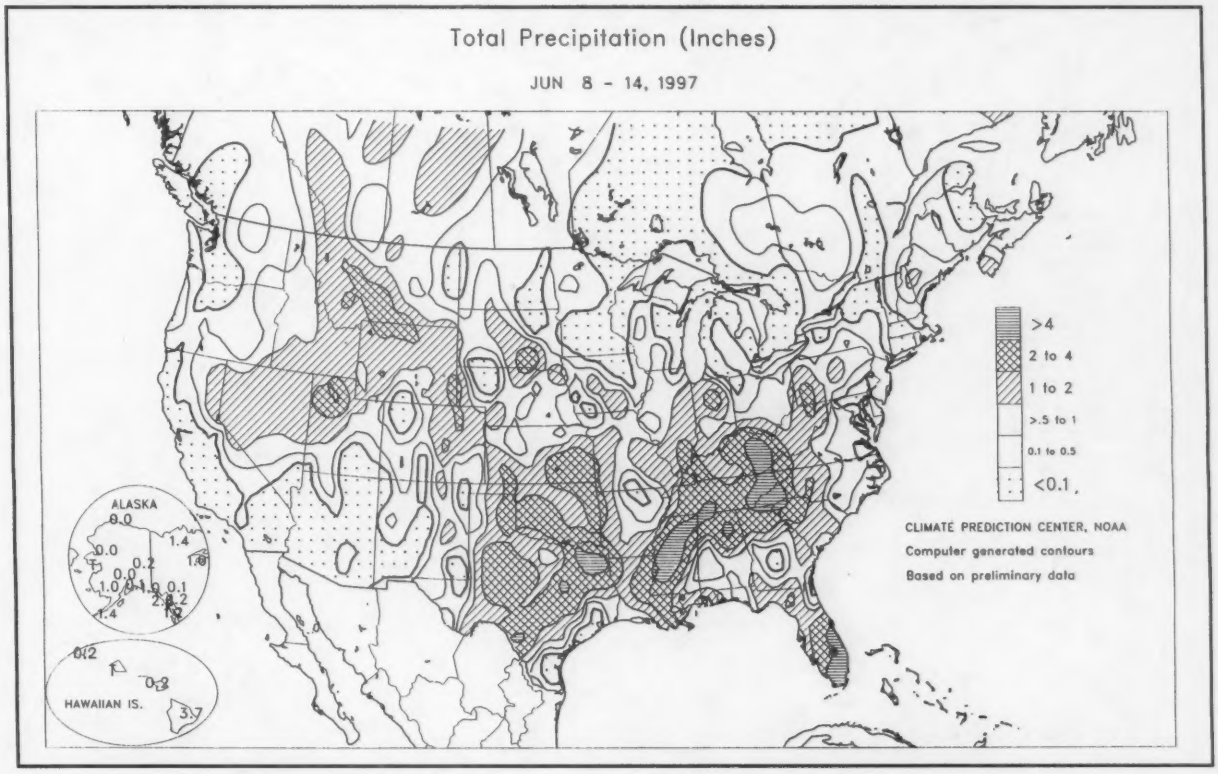
Volume 84, No. 24 June 17, 1997

WEEKLY WEATHER AND CROP BULLETIN

U.S. DEPARTMENT OF COMMERCE
National Oceanic and Atmospheric Administration
National Weather Service

U.S. DEPARTMENT OF AGRICULTURE
National Agricultural Statistics Service
and World Agricultural Outlook Board



HIGHLIGHTS

June 8 - 14, 1997

A broad area centered on the **lower Ohio and middle Mississippi Valleys** experienced a tenth consecutive week of sub-normal temperatures (up to 6°F below normal), although high temperatures occasionally in the 80's and less intense showers favored crop development. Meanwhile, much cooler weather invaded the **Southwest**, accompanied by rain as far south as **central California**. Very warm conditions (departures up to +10°F) prevailed, however, across the **Nation's northern tier**, further drying topsoils. Rainfall during the week was most heavily concentrated in an arc from **western Montana** into the **South-Central and Southeastern States**. Excessive rain, locally topping 10 inches, fell on **southern Florida**.

(Continued on page 5)

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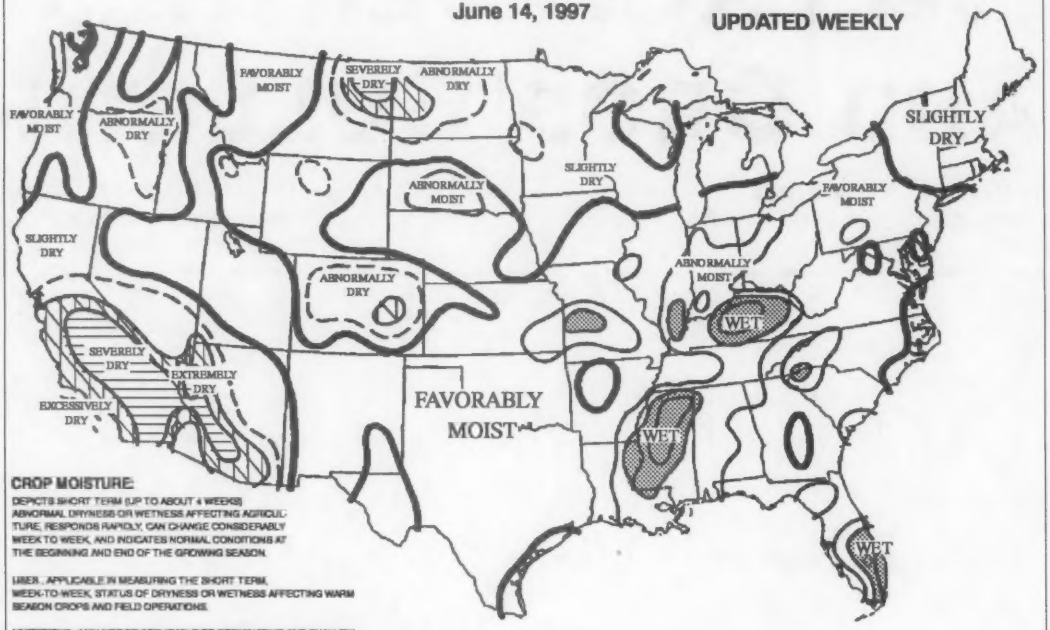
CROP MOISTURE

(SHORT TERM, CROP NEED VS. AVAILABLE WATER IN 5-FT. SOIL PROFILE)

June 14, 1997

UPDATED WEEKLY



CROP MOISTURE:

DEPICTS SHORT TERM (UP TO ABOUT 4 WEEKS) ABNORMAL DRYNESS OR WETNESS AFFECTING AGRICULTURE, RESPONDS RAPIDLY, CAN CHANGE CONSIDERABLY WEEK TO WEEK, AND INDICATES NORMAL CONDITIONS AT THE BEGINNING AND END OF THE GROWING SEASON.

USER...APPLICABLE IN MEASURING THE SHORT TERM, WEEK-TO-WEEK, STATUS OF DRYNESS OR WETNESS AFFECTING WARM SEASON CROPS AND FIELD OPERATIONS.

LIMITATIONS...MAY NOT BE APPLICABLE TO GERMINATING AND SHALLOW ROOTED CROPS WHICH ARE UNABLE TO EXTRACT THE DEEP OR SUBSOIL MOISTURE FROM A 5-FOOT PROFILE, OR FOR COOL SEASON CROPS GROWING WHEN TEMPERATURES ARE AVERAGING BELOW ABOUT 50 F. IT IS NOT GENERALLY INDICATIVE OF THE LONG TERM (MONTHS, YEARS) DROUGHT OR WET SPELLS WHICH ARE DEPICTED BY THE DROUGHT SEVERITY INDEX.

NOAA/USDA JOINT AGRICULTURAL WEATHER FACILITY Based on preliminary reports

CROP MOISTURE INDEX

(SHORT TERM, CROP NEED VS. AVAILABLE WATER IN 5-FT. SOIL PROFILE)

June 14, 1997

(Index values are in tenths; example: 37 = 3.7)

SHADED AREAS:
INDEX INCREASED OR DID NOT CHANGE

ABOVE 3	EXCESSIVELY WET; SOME FIELDS FLOODED
2 TO 3	TOO WET; SOME STANDING WATER
1 TO 2	SOME FIELDS TOO WET; PROSPECTS ABOVE NORMAL
0 TO 1	MOISTURE ADEQUATE FOR PRESENT CROP NEEDS
0 TO -1	PROSPECTS IMPROVED BUT RAIN STILL NEEDED
-1 TO -2	SOME IMPROVEMENT BUT STILL ABNORMALLY DRY
-2 TO -3	DRYNESS EASED BUT FIELDS STILL EXCESSIVELY DRY
-3 TO -4	SEVERE DRYNESS CONTINUES; MORE RAIN URGENTLY NEEDED
BELOW -4	NOT ENOUGH RAIN; STILL EXTREMELY DRY

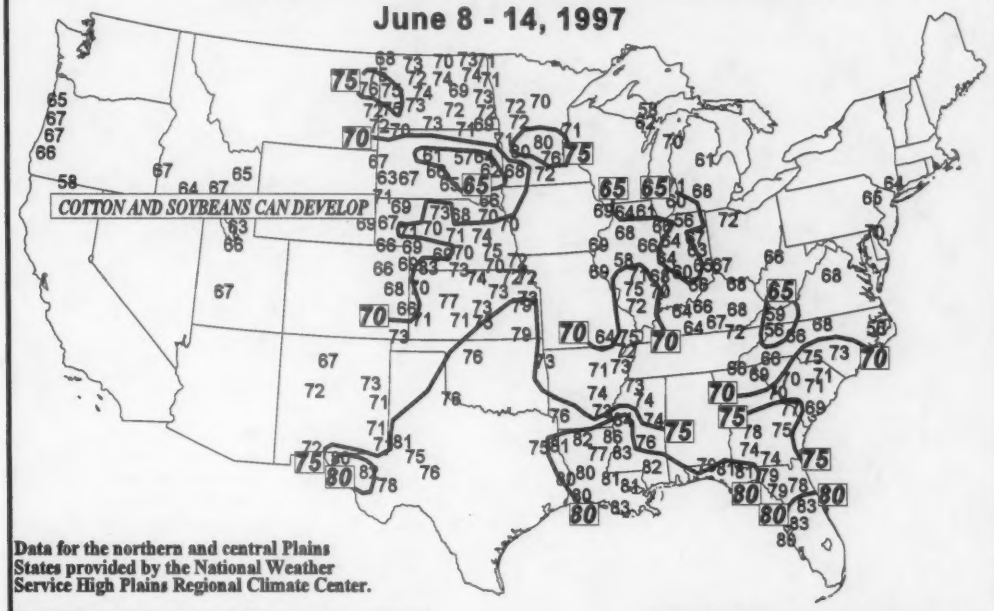
UNSHADED AREAS:
INDEX DECREASED

ABOVE 3	SOME DRYING BUT STILL EXCESSIVELY WET
2 TO 3	MORE DRY WEATHER NEEDED; WORK DELAYED
1 TO 2	FAVORABLE EXCEPT STILL TOO WET IN SPOTS
0 TO 1	FAVORABLE FOR NORMAL GROWTH AND FIELDWORK
0 TO -1	TOPSOIL MOISTURE SHORT; GERMINATION SLOW
-1 TO -2	ABNORMALLY DRY; PROSPECTS DETERIORATING
-2 TO -3	EXCESSIVELY DRY; YIELD PROSPECTS REDUCED
-3 TO -4	POTENTIAL YIELDS SEVERELY CUT BY DRYNESS
BELOW -4	EXTREMELY DRY; MOST CROPS RUINED

NOAA/USDA JOINT AGRICULTURAL WEATHER FACILITY Based on preliminary reports

Average Soil Temperature (°F 4-Inch Bare)

June 8 - 14, 1997



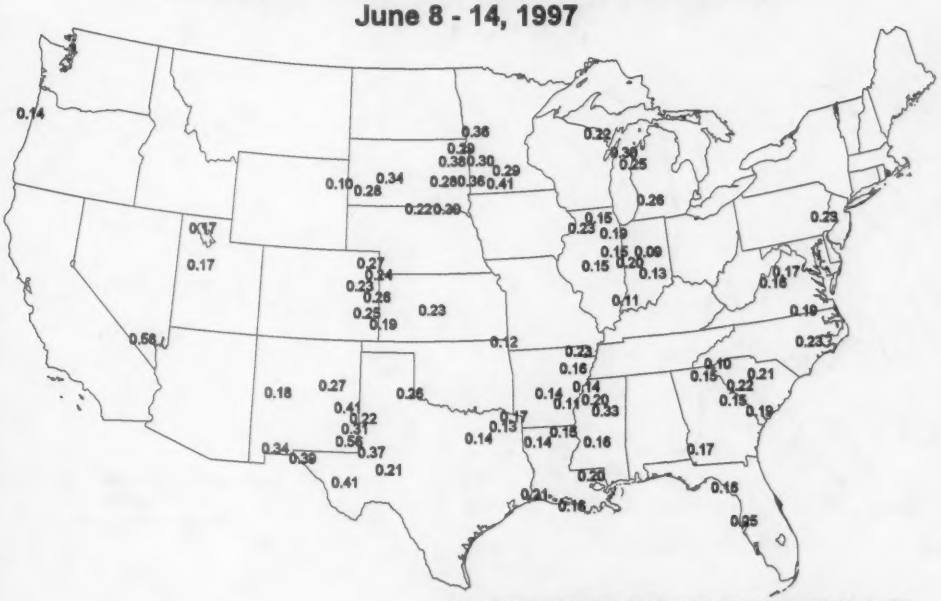
Data for the northern and central Plains States provided by the National Weather Service High Plains Regional Climate Center.

NOAA/USDA JOINT AGRICULTURAL WEATHER FACILITY
Based on preliminary data

Last chart for season

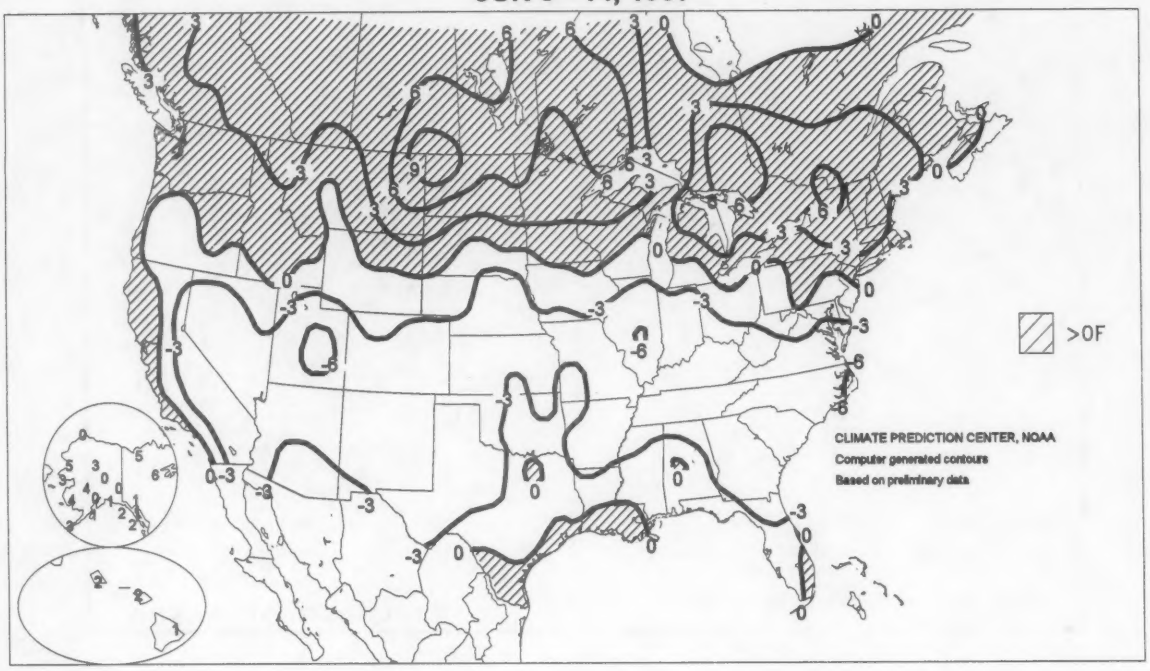
Average Pan Evaporation (Inches/Day)

June 8 - 14, 1997

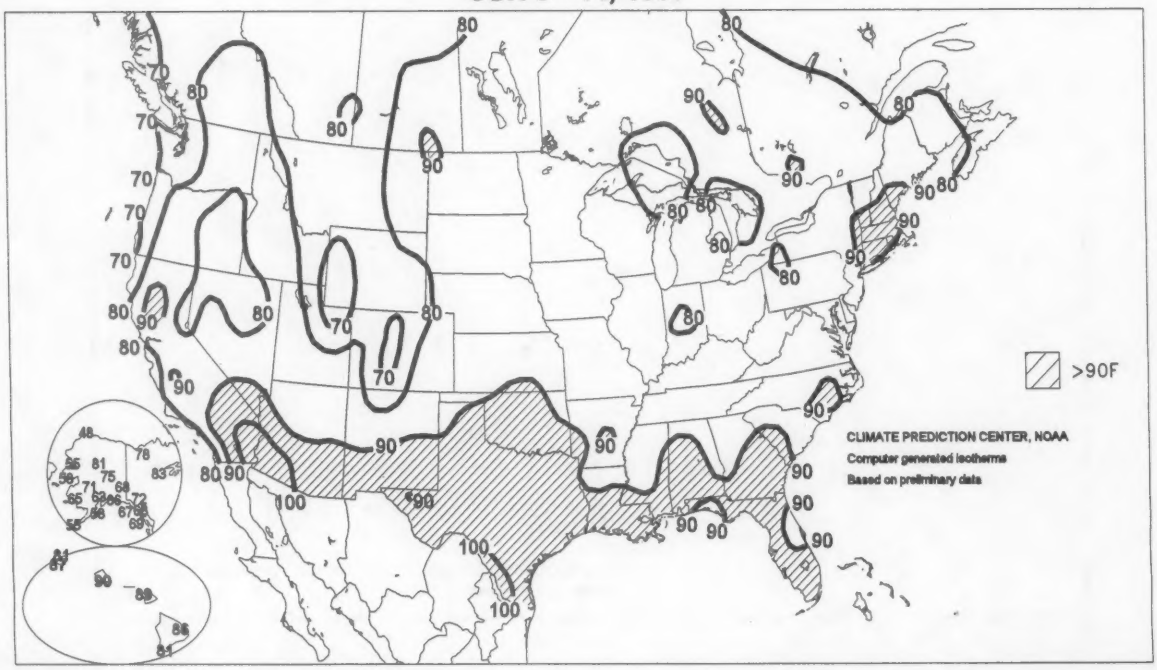


NOAA/USDA JOINT AGRICULTURAL WEATHER FACILITY
Based on preliminary data

Departure of Average Temperature from Normal (°F)
JUN 8 - 14, 1997



Extreme Maximum Temperature (°F)
JUN 8 - 14, 1997



(Continued from front cover)

Early in the week, heavy rain spread eastward from **Texas**. **Austin, TX** set daily rainfall records on consecutive days, including 1.73 inches on Sunday. On Tuesday, a June-record 6.49 inches pelted **Jackson, MS**. In **southern Florida**, June 9-10 rainfall totaled 16.36 inches near **Homestead**. Daily-record totals on June 9 included 5.89 inches in **Miami**, 3.42 inches in **West Palm Beach**, and 3.18 inches in **Key West**. Meanwhile, cool weather lingered in the **East**, resulting in more than a dozen daily-record lows. On Monday, minima included 41°F in **Atlantic City, NJ** and 45°F in **Baltimore, MD**.

On June 10, **Madison, WI** logged 83°F, their first 80-degree high since September 10, 1996. A day later, **St. Louis, MO** attained 80°F for the first time since May 25. In **Indianapolis, IN**, where 1997 maxima peaked at 80°F or above only on April 30, May 18, and May 24, the week passed without 80-degree warmth. Farther east, a record-setting streak of sub-80°F temperatures ended at 273 days on June 10 in **Boston, MA**. In fact, **Boston's** mercury reached 90°F on June 10-12 (92, 93, and 90°F), their first such streak in June since 1991.

In **California**, 0.37 inches of rain fell in downtown **Sacramento** on June 12-13. Meanwhile in **Nevada**, more than an inch of rain soaked **Ely, Reno**, and **Winnemucca**. Nearly 4 inches fell during the week in **Colorado Springs, CO**, boosting their monthly total to 4.99 inches (504 percent of normal). In **Montana**, more than 2 inches drenched **Butte** and **Great Falls**. On the **central and southern Plains**, weekly totals topped 2 inches in locations such as **Dodge City, KS, Oklahoma City, OK**, and **Amarillo, TX**. Farther east, in excess of 4 inches pounded **Lexington, KY** and **Nashville, TN**. On Friday, a cold front approached **New England**, generating a daily-record rainfall of 1.70 inches in **Caribou, ME**.

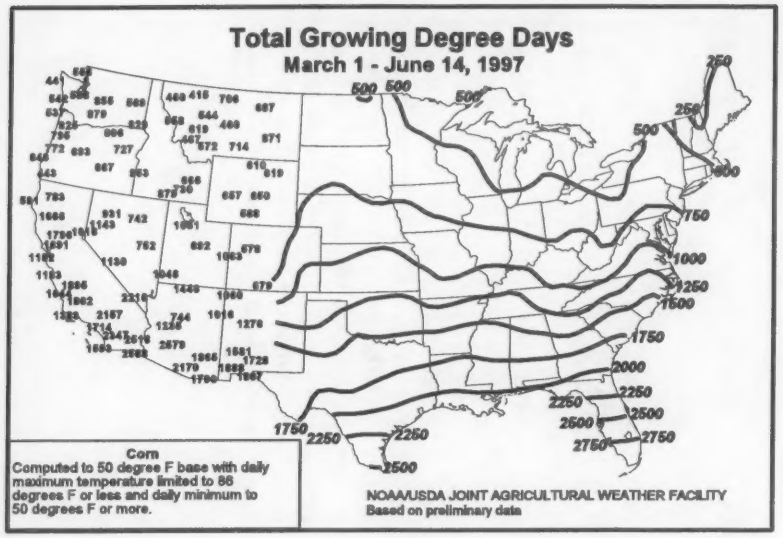
Normal to above-normal temperatures prevailed in **Alaska** and **Hawaii**. In **Barrow, AK**, the mercury touched 40°F on June 11, ending a 278-day streak--13 days shy of their 1967-68 record--of sub-40-degree weather. **Honolulu, HI** notched consecutive daily-record highs (90 and 89°F) on June 8-9.

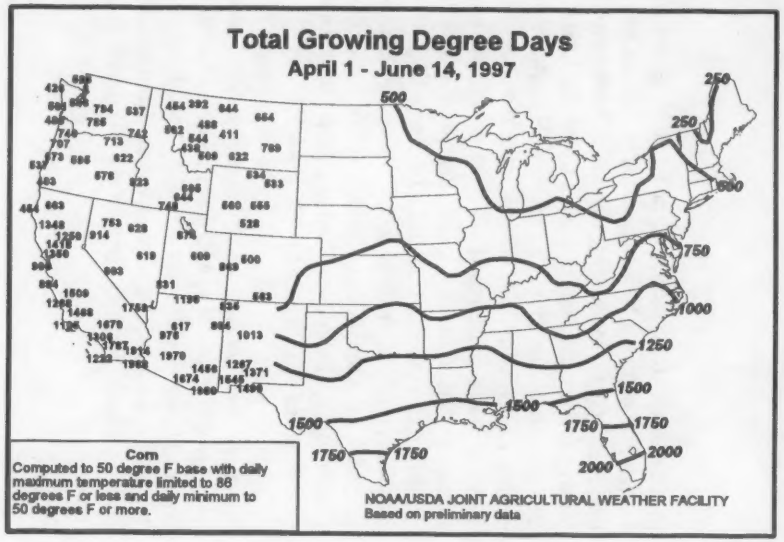
U.S. Crop Production Highlights

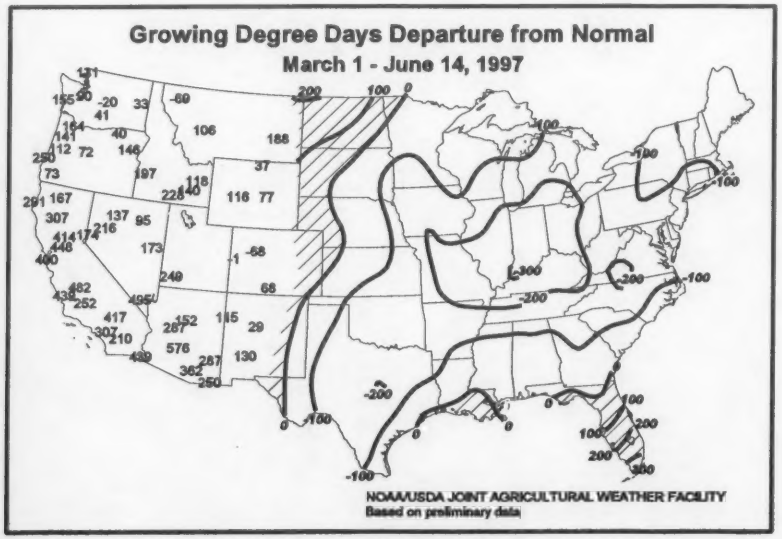
The following information was released by USDA's Agricultural Statistics Board on June 12, 1997. Forecasts refer to June 1.

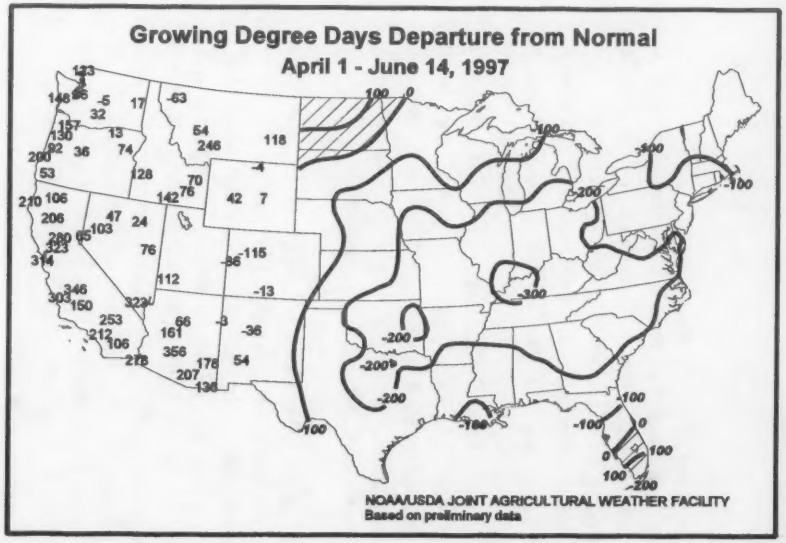
Winter wheat production is forecast at 1.60 billion bushels, up 3 percent (%) from last month and 8% higher than 1996. The U.S. yield is forecast at 39.3 bushels per acre. This is up 1.1 bushels from May 1 and 2.1 bushels per acre better than last year. Grain area totals 40.8 million acres, unchanged from last month.

Hard Red Winter (HRW) wheat production is up 3% from last month's forecast, at 921 million bushels. Improved Kansas and Oklahoma yields more than offset HRW declines elsewhere. Soft Red Winter wheat, at 422 million bushels, is also up 3% and now about equal to last year's total. White Winter wheat production is up from last month due to improved Washington yield expectations.


Total Growing Degree Days
March 1 - June 14, 1997
Corn
Computed to 50 degree F base with daily maximum temperature limited to 86 degrees F or less and daily minimum to 50 degrees F or more.
NOAA/USDA JOINT AGRICULTURAL WEATHER FACILITY
Based on preliminary data


Total Growing Degree Days
April 1 - June 14, 1997
Corn
Computed to 50 degree F base with daily maximum temperature limited to 86 degrees F or less and daily minimum to 50 degrees F or more.
NOAA/USDA JOINT AGRICULTURAL WEATHER FACILITY
Based on preliminary data


Growing Degree Days Departure from Normal
March 1 - June 14, 1997
NOAA/USDA JOINT AGRICULTURAL WEATHER FACILITY
Based on preliminary data


Growing Degree Days Departure from Normal
April 1 - June 14, 1997
NOAA/USDA JOINT AGRICULTURAL WEATHER FACILITY
Based on preliminary data

National Weather Data for Selected Cities

Weather Data for the Week Ending June 14, 1997

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY, PERCENT		NUMBER OF DAYS			
																	TEMP, °F		PRECIP.	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL IN., SINCE Jan 1	PCT. NORMAL SINCE Jan 1	TOTAL IN., SINCE Jan 1	PCT. NORMAL SINCE Jan 1	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
AL	BIRMINGHAM	82	66	90	61	74	-2	1.21	0.38	1.01	2.14	127	25.98	94	93	63	1	0	3	1
	HUNTSVILLE	77	64	89	60	71	-4	1.18	0.24	0.61	1.68	87	28.26	98	92	69	0	0	7	1
	MOBILE	84	70	91	68	77	-3	2.30	1.17	1.69	2.73	119	32.97	113	96	70	1	0	6	2
	MONTGOMERY	84	67	91	62	76	-1	0.27	-0.87	0.16	0.57	26	24.39	90	92	59	2	0	3	0
AK	ANCHORAGE	60	46	63	44	53	0	0.10	-0.15	0.06	0.33	70	2.33	56	84	49	0	0	2	0
	BARROW	37	28	48	27	33	0	0.00	-0.04	0.00	0.00	0	0.24	30	97	82	0	7	0	0
	FAIRBANKS	69	49	75	44	59	0	0.16	-0.14	0.12	0.16	29	0.91	33	83	42	0	0	3	0
	JUNEAU	59	48	68	39	54	1	–	–	–	–	–	–	–	94	84	0	0	-	-
	KODIAK	54	44	58	35	49	0	0.43	-0.74	0.16	0.43	18	33.14	113	96	67	0	0	4	0
	NOME	55	41	58	35	48	3	0.02	-0.21	0.02	0.03	7	4.09	111	88	70	0	0	1	0
AZ	FLAGSTAFF	68	40	73	35	54	-4	0.00	-0.02	0.00	0.08	400	8.27	70	77	29	0	0	0	0
	PHOENIX	96	74	100	69	85	-2	0.00	-0.01	0.00	0.00	0	1.70	66	38	15	7	0	0	0
	PRESCOTT	77	52	82	47	64	-2	0.00	-0.03	0.00	0.07	233	4.40	70	59	21	0	0	0	0
	TUCSON	94	67	97	59	80	-3	0.00	0.00	0.00	0.02	–	2.54	93	44	14	6	0	0	0
	YUMA	96	72	100	65	83	-3	0.00	0.00	0.00	0.20	–	0.75	77	55	19	5	0	0	0
AR	FORT SMITH	83	65	90	61	74	-2	1.42	0.59	0.56	1.42	80	17.87	92	95	62	1	0	4	1
	LITTLE ROCK	83	66	91	62	75	-3	0.19	-0.66	–	0.27	16	27.36	115	94	60	1	0	-	-
CA	BAKERSFIELD	85	61	91	55	73	-4	0.00	-0.03	0.00	0.00	0	2.99	79	82	30	2	0	0	0
	EUREKA	63	51	66	50	57	2	0.05	-0.09	0.03	1.00	313	19.07	92	92	68	0	0	2	0
	FRESNO	85	62	91	55	73	-2	0.00	-0.03	0.00	0.01	17	3.52	51	72	34	2	0	0	0
	LOS ANGELES	73	63	76	61	68	3	0.00	0.00	0.00	0.00	0	4.21	54	80	58	0	0	0	0
	REDDING	88	64	96	58	76	1	0.03	-0.12	0.03	1.48	448	18.50	89	95	29	3	0	1	0
	SACRAM/MCCLELL	88	61	90	59	74	–	0.45	–	0.45	0.81	–	9.26	–	90	30	4	0	1	0
	SAN DIEGO	70	63	72	61	66	0	0.00	-0.03	0.00	0.00	0	3.54	57	78	63	0	0	0	0
	SAN FRANCISCO	70	55	75	53	62	1	0.00	-0.03	0.00	0.18	300	8.72	71	85	54	0	0	0	0
CO	ALAMOSA	71	40	77	35	56	-3	0.28	0.14	0.15	0.47	188	2.70	114	87	30	0	0	3	0
	COLORADO	70	50	78	49	60	-4	3.96	3.46	2.02	4.97	497	10.23	172	93	51	0	0	6	3
	DENVER	73	51	81	48	62	-4	0.91	0.49	0.63	2.02	232	5.76	79	94	48	0	0	7	1
	GRAND JUNCTION	78	55	85	52	67	-5	0.29	0.18	0.21	0.29	116	5.17	136	76	29	0	0	4	0
	PUEBLO	78	53	86	48	66	-4	0.66	0.39	0.32	1.91	367	5.58	138	94	37	0	0	5	0
CT	BRIDGEPORT	79	59	90	50	69	3	0.61	-0.19	0.60	0.88	54	17.30	89	92	48	1	0	2	1
	HARTFORD	86	56	93	45	71	3	0.00	-0.90	0.00	0.11	6	14.05	70	82	32	3	0	0	0
DC	WASHINGTON	81	60	88	50	71	-4	0.39	-0.39	0.34	2.42	153	17.38	105	88	52	0	0	3	0
DE	WILMINGTON	81	58	87	46	69	-1	0.32	-0.48	0.32	1.52	94	10.98	80	93	47	0	0	1	0
FL	DAYTONA BEACH	84	72	90	69	78	-1	2.26	0.87	1.48	4.42	166	18.28	95	91	67	1	0	6	2
	JACKSONVILLE	83	69	91	62	76	-3	0.58	-0.65	0.32	2.32	98	16.37	86	95	67	2	0	4	0
	KEY WEST	87	78	90	72	83	0	3.79	2.57	3.20	4.23	176	13.61	104	87	74	1	0	5	1
	MIAMI	87	74	91	72	81	0	9.33	7.07	5.89	10.48	237	30.76	154	97	71	2	0	6	5
	ORLANDO	88	71	89	67	79	-2	2.10	0.43	1.25	3.25	103	17.43	102	97	68	0	0	6	1
	TAMPA	89	73	91	67	81	0	0.16	-1.07	0.06	0.20	9	15.48	106	92	64	4	0	4	0
	VALPARAISO/EGLIN	85	71	90	66	78	-1	0.49	-0.68	0.41	0.54	25	28.62	112	92	66	1	0	2	0
	WEST PALM BEACH	86	74	91	73	80	-1	5.19	3.26	3.47	10.03	282	30.30	139	93	68	2	0	7	3
GA	ATHENS	79	62	88	58	71	-5	2.01	1.13	1.34	2.54	143	21.84	89	94	64	0	0	3	2
	ATLANTA	78	62	86	55	70	-5	1.45	0.65	1.38	1.81	112	24.21	95	93	59	0	0	3	1
	AUGUSTA	83	62	93	52	72	-4	1.78	0.82	0.87	2.05	108	17.80	81	93	53	1	0	4	1
	COLUMBUS	83	67	89	61	75	-4	0.21	-0.69	0.19	0.84	47	23.30	92	89	53	0	0	2	0
	MACON	82	63	90	55	73	-5	0.37	-0.44	0.31	0.46	29	19.64	86	95	58	1	0	2	0
	SAVANNAH	82	64	91	57	73	-5	0.89	-0.40	0.86	2.13	86	15.36	78	97	60	1	0	3	1
HI	HILO	83	70	85	67	77	1	3.64	2.27	1.34	7.20	252	53.39	88	93	61	0	0	7	2
	HONOLULU	88	75	90	73	81	2	0.01	-0.11	0.01	0.08	21	14.46	133	78	49	1	0	1	0
	KAHULUI	87	72	89	67	79	2	–	–	–	–	–	–	–	87	56	0	0	-	-
	LIHUE	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	-	-	-	-
ID	BOISE	77	53	81	51	65	0	0.60	0.40	0.37	0.93	216	7.35	112	86	39	0	0	4	0
	LEWISTON	74	56	81	51	65	0	0.37	0.07	0.27	0.57	90	9.22	146	78	46	0	0	2	0
	POCATELLO	71	49	77	46	60	-1	0.71	0.46	0.49	0.75	142	5.47	87	92	51	0	0	3	0
IL	CHICAGO/OHARE	76	53	84	45	65	-3	0.12	-0.76	0.12	0.21	12	11.76	83	93	49	0	0	1	0
	MOLINE	79	57	86	53	68	-2	0.48	-0.49	0.21	1.93	98	15.74	99	87	45	0	0	4	0
	PEORIA	78	57	80	51	68	-4	0.51	-0.40	0.35	1.18	85	13.94	92	89	57	0	0	4	0
	ROCKFORD	77	55	83	50	66	-2	0.42	-0.64	0.27	1.67	81	14.67	103	86	44	0	0	3	0
	SPRINGFIELD	76	58	80	53	67	-5	0.40	-0.40	0.17	0.59	37	10.34	67	97	58	0	0	4	0
IN	EVANSVILLE	78	60	81	55	69	-6	1.94	1.13	0.83	3.95	235	29.19	139	98	66	0	0	4	2
	FORT WAYNE	77	56	82	51	66	-3	0.88	0.04	0.78	2.45	147	18.71	123	94	50	0	0	3	1
	INDIANAPOLIS	75	59	79	57	67	-4	0.03	-0.77	0.02	0.96	62	19.93	112	93	57	0	0	2	0
	SOUTH BEND	77	54	81	50	66	-3	0.19	-0.76	0.17	1.28	69	13.32	82	83	42	0	0	2	0
IA	BURLINGTON	77	58	81	55	67	-3	1.03	0.09	0.63	1.37	74	15.00	104	90	53	0	0	5	1
	CEDAR RAPIDS	79	57	84	53	68	-1	0.03	-1.04	0.03	0.64	30	11.97	90	87	47	0	0	1	0
	DES MOINES	78	58	81	53	68	-1	0.31	-0.76	0.28	0.81	28	10.53	75	87	49	0	0	2	0
	DUBUQUE	77	55	83	52	66	-1	0.48	-0.49	0.33	1.41	72	12.47	81	88	43	0	0	4	0
	SIOUX CITY	81	55	86	48	68	-2	1.20	0.32	0.98	1.20	68	8.76	80	89	43	0	0	3	1
	WATERLOO	81	57	87	52	69	1	0.00	-1.02	0.00	0.80	40	10.39	77	85	37	0	0	0	0
KS	CONCORDIA	80	58	87	52	69	-3	0.74	-0.33	0.58	0.93	43	7.89	64	91	48	0	0	2	1
	DODGE CITY	78	59	86	55	68	-5	2.18	1.46	1.22	2.90	206	9.18	100	93	57	0	0	6	2
	GOODLAND	77	52	86	41	64	-4	0.23	-0.63	0.14	0.39	25	4.14	50	92	48	0	0	3	0
	TOPEKA	80	58	86	53	69	-4	0.36	-0.99	0.28	0.41	15	12.10	83	93	51	0	0	2	0

Based on 1961-90 normals

Weather Data for the Week Ending June 14, 1997

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY, PERCENT		NUMBER OF DAYS			
																	TEMP, °F		PRECIP.	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE Jan 1	PCT. NORMAL SINCE Jan 1	TOTAL, IN., SINCE Jan 1	PCT. NORMAL SINCE Jan 1	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
	WICHITA	80	62	89	59	71	-3	1.87	0.52	1.34	1.99	74	13.56	93	88	53	0	0	2	2
KY	JACKSON	72	59	81	54	65	-6	2.97	2.01	1.03	3.41	176	25.65	112	98	67	0	0	6	3
	LEXINGTON	72	60	80	54	66	-5	4.54	3.71	2.25	5.89	353	38.61	189	99	79	0	0	6	2
	LOUISVILLE	76	63	83	60	70	-3	3.56	2.77	1.75	4.65	287	38.63	181	99	71	0	0	4	2
	PADUCAH	78	62	83	58	70	-5	1.73	0.78	1.56	3.03	158	31.36	131	98	66	0	0	2	1
LA	BATON ROUGE	88	72	91	68	80	0	0.63	-0.36	0.29	0.97	35	34.70	126	97	63	3	0	3	0
	LAKE CHARLES	89	72	92	69	81	1	0.11	-1.06	0.11	0.34	14	33.33	146	94	59	3	0	1	0
	NEW ORLEANS	87	73	92	69	80	1	2.40	1.08	1.86	2.59	99	26.53	96	91	62	3	0	4	2
	SHREVEPORT	86	67	89	63	76	-1	2.21	1.19	1.13	2.48	115	38.92	161	97	65	0	0	5	1
ME	CARIBOU	74	48	85	41	61	2	1.82	1.17	1.69	1.83	141	15.97	117	85	41	0	0	4	1
	PORTLAND	78	50	90	39	64	3	0.10	-0.71	0.06	0.26	16	16.52	83	92	50	2	0	3	0
MD	BALTIMORE	81	58	87	45	69	-3	0.02	-0.83	0.02	2.10	120	18.25	101	94	47	0	0	1	0
MA	BOSTON	81	58	93	48	70	3	0.71	-0.02	0.71	0.73	49	14.51	76	80	39	3	0	1	1
	WORCESTER	79	57	88	47	68	5	0.32	-0.59	0.26	0.44	24	17.69	83	81	38	0	0	2	0
MI	ALPENA	81	49	89	41	65	5	0.03	-0.69	0.03	0.03	2	13.09	114	92	37	0	0	1	0
	GRAND RAPIDS	80	54	84	49	67	1	0.03	-0.84	0.02	0.03	2	12.94	92	93	45	0	0	2	0
	HOUGHTON LAKE	79	48	85	41	64	2	0.09	-0.63	0.05	0.24	17	10.74	99	95	35	0	0	2	0
	LANSING	78	50	83	43	64	-1	0.04	-0.76	0.04	0.16	10	12.17	99	90	41	0	0	1	0
	MARQUETTE	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	-	-	-	-
	MUSKEGON	77	51	81	46	64	0	0.00	-0.56	0.00	0.29	25	10.65	82	91	40	0	0	0	0
MN	DULUTH	78	50	83	44	64	5	0.00	-0.89	0.00	0.34	19	6.17	56	86	38	0	0	0	0
	INT'L FALLS	79	44	84	33	62	1	0.00	-0.91	0.00	0.25	14	5.09	61	90	32	0	0	0	0
	MINNEAPOLIS	83	56	95	51	69	2	0.01	-0.95	0.01	0.70	37	6.45	56	82	32	0	0	1	0
	ROCHESTER	78	54	91	49	66	1	0.09	-0.76	0.08	0.36	21	9.85	89	84	38	0	0	2	0
	ST. CLOUD	83	51	97	48	67	3	0.00	-1.10	0.00	0.77	36	5.86	56	86	29	0	0	0	0
MS	JACKSON	85	68	88	66	77	-1	7.02	6.27	6.49	7.02	471	35.09	126	98	64	0	0	4	1
	MERIDIAN	86	66	90	65	77	0	0.54	-0.26	0.34	0.64	41	31.18	108	96	65	1	0	4	0
	TUPELO	79	66	86	63	73	-4	3.50	2.60	1.59	4.69	248	35.09	123	96	73	0	0	5	3
MO	COLUMBIA	76	60	83	56	68	-3	1.15	0.22	0.63	1.29	66	18.82	112	99	67	0	0	4	1
	KANSAS CITY	79	59	85	55	69	-3	0.88	-0.24	0.67	0.88	39	14.34	95	92	54	0	0	3	1
	SAINT LOUIS	76	62	81	58	69	-5	0.74	-0.11	0.72	0.88	51	16.28	97	96	63	0	0	2	1
	SPRINGFIELD	78	59	84	54	69	-3	0.94	-0.34	0.47	0.96	37	17.82	93	97	61	0	0	4	0
MT	BILLINGS	73	56	77	53	65	1	0.12	-0.38	0.10	0.44	42	4.52	56	94	63	0	0	2	0
	BUTTE	66	48	72	43	57	2	2.18	1.66	0.76	2.57	245	10.71	194	97	55	0	0	6	2
	GLASGOW	80	59	83	54	70	6	0.84	0.14	0.31	0.87	68	4.12	92	84	44	0	0	3	0
	GREAT FALLS	67	51	73	48	59	-1	2.12	1.52	1.03	2.62	213	7.58	98	96	64	0	0	4	2
	KALISPELL	74	49	80	41	62	5	1.27	0.72	1.06	1.73	157	10.17	132	95	43	0	0	2	1
	MILES CITY	86	59	87	49	72	6	0.45	-0.24	0.38	0.51	38	4.08	62	81	36	0	0	2	0
	MISSOULA	73	50	79	42	61	3	1.07	0.63	0.79	1.57	173	9.02	135	88	49	0	0	5	1
NE	GRAND ISLAND	78	56	86	51	67	-4	1.27	0.32	1.27	1.55	81	7.77	69	94	52	0	0	1	1
	LINCOLN	80	56	89	51	68	-3	0.27	-0.66	0.27	0.27	14	7.57	64	89	44	0	0	1	0
	NORFOLK	77	54	86	50	66	-4	0.33	-0.74	0.33	0.50	23	7.94	71	91	49	0	0	1	0
	NORTH PLATTE	79	50	85	42	64	-2	0.60	-0.20	0.31	1.40	87	4.08	45	93	44	0	0	3	0
	OMAHA	81	57	88	51	69	-2	0.50	-0.43	–	0.50	26	6.75	53	91	50	0	0	-	-
	SCOTTSBLUFF	75	53	81	51	64	-2	1.33	0.70	0.58	2.69	209	12.73	166	94	49	0	0	3	2
	VALENTINE	77	52	86	43	65	-2	0.42	-0.25	0.20	2.06	151	8.72	110	92	47	0	0	4	0
NV	ELY	67	43	78	39	55	-3	1.76	1.54	0.76	1.76	396	5.44	110	87	41	0	0	5	2
	LAS VEGAS	88	70	96	61	79	-5	0.00	-0.03	0.00	0.00	0	0.24	13	35	18	4	0	0	0
	RENO	73	47	80	44	60	-4	1.16	1.05	0.40	1.18	472	5.56	135	84	38	0	0	6	0
	WINNEMUCCA	72	48	78	43	60	-3	1.31	1.09	0.73	1.98	445	5.11	119	93	41	0	0	5	1
NH	CONCORD	84	51	93	38	68	4	0.04	-0.70	0.02	0.13	9	14.30	93	90	34	3	0	2	0
NJ	NEWARK	82	62	92	50	72	0	0.30	-0.42	0.30	1.69	115	18.72	95	84	44	2	0	1	0
NM	ALBUQUERQUE	79	55	86	51	67	-6	0.33	0.22	0.33	0.88	400	3.73	139	65	22	0	0	1	0
NY	ALBANY	83	55	89	46	69	3	0.24	-0.61	0.20	0.27	16	11.02	70	86	40	0	0	3	0
	BINGHAMTON	76	53	83	48	64	1	1.37	0.53	0.91	1.54	98	13.19	84	92	45	0	0	3	1
	BUFFALO	74	56	78	52	65	0	0.15	-0.70	0.12	1.34	80	18.26	118	89	52	0	0	2	0
	ROCHESTER	79	54	84	49	66	2	0.00	-0.72	0.00	0.92	65	12.81	97	91	41	0	0	0	0
	SYRACUSE	80	56	87	49	68	4	0.06	-0.82	0.05	0.62	36	11.76	75	86	44	0	0	2	0
NC	ASHEVILLE	72	56	84	47	64	-5	1.89	0.75	1.20	3.49	152	26.80	106	98	67	0	0	4	1
	CHARLOTTE	80	62	87	54	71	-4	3.60	2.82	2.41	5.11	323	21.61	108	90	53	0	0	4	2
	GREENSBORO	76	57	84	48	67	-6	1.56	0.66	0.84	2.86	163	21.72	115	93	55	0	0	3	2
	HATTERAS	73	60	78	63	66	-7	0.12	-0.82	0.11	1.58	85	21.41	93	89	64	0	0	2	0
	RALEIGH	79	57	84	48	68	-5	0.72	-0.13	0.43	3.11	180	19.49	102	95	53	0	0	3	0
	WILMINGTON	80	59	89	51	70	-5	0.59	-0.48	0.59	1.83	88	15.88	70	95	55	0	0	1	1
ND	BISMARCK	83	55	88	50	69	6	0.06	-0.58	0.06	0.13	10	6.07	89	79	33	0	0	1	0
	DICKINSON	82	55	88	47	68	6	0.66	-0.11	0.65	0.92	60	6.65	90	83	37	0	0	2	1
	FARGO	84	56	87	48	70	8	0.32	-0.34	0.30	1.04	80	9.12	117	70	27	0	0	2	0
	GRAND FORKS	86	56	89	49	71	8	0.00	-0.66	0.00	0.31	24	5.36	79	69	25	0	0	0	0
	JAMESTOWN	83	55	86	53	69	5	0.02	-0.67	0.02	1.00	76	5.58	84	76	29	0	0	1	0
	WILLISTON	87	59	92	47	73	10	0.03	-0.49	0.03	0.03	3	1.88	31	67	27	2	0	1	0
OH	AKRON-CANTON	77	54	83	49	66	-1	0.92	0.20	0.74	1.63	112	15.25	95	86	47	0	0	3	1
	CINCINNATI	74	58	80	54	66	-4	2.18	1.30	1.35	3.45	193	22.56	117	96	64	0	0	4	2
	CLEVELAND	76	56	81	50	66	-1	0.08	-0.77	0.04	1.60	94	15.96	103	92	52	0	0	2	0
	COLUMBUS	77	58	82	53	67	-1	2.00	1.06	1.97	3.19	171	18.22	109	90	48	0	0	3	1
	DAYTON	75	57	80	52	66	-3	0.13	-0.78	0.09	1.52	84	16.91	100	89	49	0	0	2	0
	MANSFIELD	76	56	81	51	66	-1	0.62	-0.31	0.59	1.57	84	18.94	110	88	47	0	0	2	1

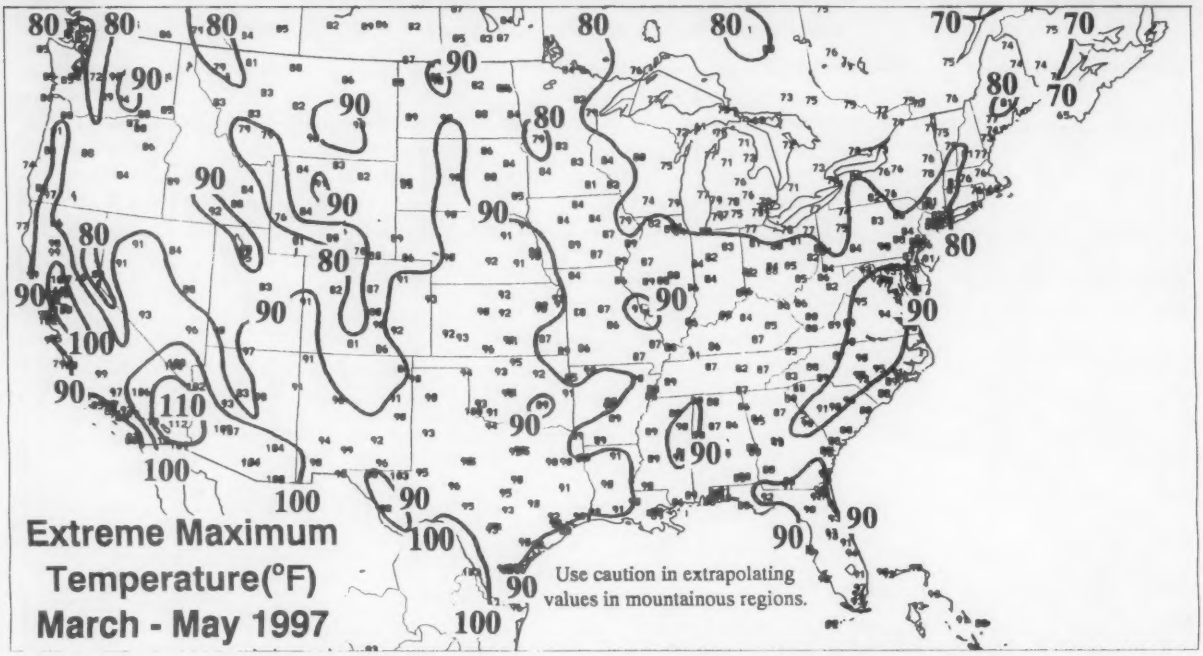
Based on 1961-90 normals

Weather Data for the Week Ending June 14, 1997

STATES AND STATIONS		TEMPERATURE °F						PRECIPITATION							RELATIVE HUMIDITY, PERCENT		NUMBER OF DAYS			
																	TEMP, °F		PRECIP.	
		AVERAGE MAXIMUM	AVERAGE MINIMUM	EXTREME HIGH	EXTREME LOW	AVERAGE	DEPARTURE FROM NORMAL	WEEKLY TOTAL, IN.	DEPARTURE FROM NORMAL	GREATEST IN 24-HOUR, IN.	TOTAL, IN., SINCE Jun 1	PCT. NORMAL SINCE Jun 1	TOTAL, IN., SINCE Jan 1	PCT. NORMAL SINCE Jan 1	AVERAGE MAXIMUM	AVERAGE MINIMUM	90 AND ABOVE	32 AND BELOW	.01 INCH OR MORE	.50 INCH OR MORE
	TOLEDO	78	56	84	50	67	0	0.33	-0.55	0.33	1.75	102	18.60	136	87	38	0	0	1	0
	YOUNGSTOWN	77	52	82	48	65	-1	0.86	-0.05	0.77	2.41	134	13.00	83	94	44	0	0	2	1
OK	OKLAHOMA CITY	82	64	88	61	73	-3	2.31	1.24	0.94	2.32	103	13.63	87	93	61	0	0	4	2
	TULSA	82	65	92	63	73	-3	1.06	-0.03	0.59	1.13	50	12.16	66	96	58	1	0	5	1
OR	ASTORIA	66	51	68	46	58	2	0.41	-0.19	0.21	1.63	131	43.41	130	95	64	0	0	4	0
	BURNS	71	47	78	42	59	3	0.05	-0.16	0.05	0.25	58	5.80	121	78	35	0	0	1	0
	EUGENE	71	47	78	43	59	-2	0.31	-0.06	0.19	0.68	87	21.67	86	96	57	0	0	4	0
	MEDFORD	79	50	87	45	64	-1	0.02	-0.13	0.02	0.38	109	8.94	100	84	36	0	0	1	0
	PENDLETON	78	52	84	46	65	0	0.09	-0.08	0.06	0.65	186	4.74	76	80	36	0	0	2	0
	PORTLAND	74	54	82	51	64	2	0.41	0.03	0.39	1.68	210	24.91	138	84	44	0	0	2	0
	SALEM	73	49	80	46	61	0	0.29	-0.05	0.23	0.71	99	25.28	129	93	47	0	0	2	0
PA	ALLENTOWN	81	55	87	46	68	-1	0.02	-0.85	0.02	1.81	102	14.37	76	88	40	0	0	1	0
	ERIE	73	56	79	51	65	-1	0.06	-0.90	0.05	2.22	116	20.09	125	89	56	0	0	2	0
	MIDDLETOWN	81	60	86	49	70	0	0.49	-0.42	–	2.16	116	13.65	74	93	54	0	0	-	-
	PHILADELPHIA	82	59	88	47	70	0	0.51	-0.34	0.51	1.84	108	17.43	94	89	42	0	0	1	1
	PITTSBURGH	77	55	82	47	66	-1	2.09	1.24	1.54	2.97	174	17.25	103	92	47	0	0	2	2
	SCRANTON	79	52	86	43	65	-1	0.55	-0.39	0.43	1.35	73	10.52	69	95	49	0	0	2	0
	WILLIAMSPORT	80	53	86	46	67	0	0.84	-0.18	0.60	1.94	97	11.28	64	97	45	0	0	3	1
RI	PROVIDENCE	82	57	93	44	69	3	0.09	-0.70	0.08	0.71	44	17.44	83	79	35	2	0	2	0
SC	BEAUFORT	81	64	90	57	73	-5	0.20	-1.20	0.16	2.62	97	17.25	84	96	64	1	0	3	0
	CHARLESTON	81	63	88	55	72	-6	0.66	-0.78	0.67	6.49	231	21.81	108	95	60	0	0	2	1
	COLUMBIA	82	63	91	55	72	-4	1.80	0.71	1.06	3.02	142	19.05	86	91	49	1	0	4	1
	GREENVILLE	78	62	86	56	70	-5	3.23	2.12	1.69	3.51	159	24.53	101	89	55	0	0	3	2
SD	ABERDEEN	80	54	83	50	67	1	0.01	-0.77	0.01	1.37	89	6.89	81	83	37	0	0	1	0
	HURON	79	56	83	53	67	1	0.69	-0.11	0.41	1.25	79	7.23	76	83	40	0	0	2	0
	RAPID CITY	74	54	82	50	64	1	0.79	0.05	0.63	2.53	171	13.35	167	91	56	0	0	4	1
	SIOUX FALLS	77	52	83	48	65	-2	0.24	-0.57	0.14	0.24	15	8.27	83	90	43	0	0	2	0
TN	BRISTOL	73	57	81	49	65	-5	1.32	0.52	0.69	2.43	152	24.98	131	96	66	0	0	5	1
	CHATTANOOGA	75	62	88	59	69	-6	2.58	1.79	1.11	3.36	210	29.93	115	99	73	0	0	6	2
	KNOXVILLE	75	62	85	58	68	-4	3.10	2.19	1.38	4.26	234	31.10	135	95	68	0	0	7	4
	MEMPHIS	80	65	87	63	73	-5	1.52	0.68	0.87	1.73	99	41.93	163	97	67	0	0	6	1
	NASHVILLE	76	63	86	61	69	-5	4.22	3.38	2.02	4.36	251	28.46	122	97	71	0	0	6	3
TX	ABILENE	86	66	94	59	75	-4	2.89	2.19	1.76	3.56	252	12.61	128	94	56	3	0	4	2
	AMARILLO	80	57	90	54	69	-5	2.22	1.34	1.34	2.22	128	11.95	165	95	47	1	0	3	2
	AUSTIN	87	71	91	67	79	-2	3.94	3.00	1.71	5.24	287	24.48	163	95	63	1	0	3	3
	BEAUMONT	87	72	92	68	80	-1	0.80	-0.72	0.42	1.79	67	24.06	103	96	65	2	0	4	0
	BROWNSVILLE	91	75	93	73	83	1	0.21	-0.46	0.20	0.21	15	14.03	156	93	59	5	0	2	0
	CORPUS CHRISTI	90	73	93	70	82	0	0.01	-0.81	0.01	1.59	95	17.46	154	96	62	4	0	1	0
	DEL RIO	91	70	97	65	81	-2	1.31	0.81	1.12	1.37	139	14.60	202	95	57	3	0	5	1
	EL PASO	90	65	96	58	78	-2	0.68	0.56	0.67	0.84	382	3.05	167	63	20	4	0	2	1
	FORT WORTH	89	69	94	66	79	1	0.28	-0.55	0.20	0.28	16	20.83	116	96	63	4	0	4	0
	GALVESTON	86	78	87	74	82	1	0.24	-0.81	0.14	0.38	18	27.70	175	85	70	0	0	2	0
	HOUSTON	89	71	93	66	80	0	0.22	-0.99	0.19	0.30	12	30.26	151	95	58	4	0	2	0
	LUBBOCK	82	60	90	57	71	-6	2.40	1.74	1.34	2.64	202	12.72	194	89	51	2	0	4	2
	MIDLAND	87	64	96	59	75	-3	2.08	1.75	1.75	2.12	299	7.05	136	89	42	4	0	4	1
	SAN ANGELO	86	64	96	60	76	-3	2.16	1.56	1.02	2.16	171	14.87	171	95	50	4	0	5	2
	SAN ANTONIO	88	72	91	67	80	-2	0.53	-0.41	0.37	1.37	70	15.18	111	93	58	2	0	5	0
	VICTORIA	89	74	92	72	81	0	0.10	-1.09	0.08	1.57	66	39.41	282	96	66	4	0	2	0
	WACO	88	70	92	65	79	-2	3.13	2.31	2.06	3.13	181	26.20	168	96	58	3	0	4	2
	WICHITA FALLS	88	66	94	63	77	-3	0.94	0.05	0.63	1.16	63	12.76	94	89	52	4	0	2	1
UT	SALT LAKE CITY	74	54	81	48	64	-3	1.48	1.25	0.70	1.55	310	10.41	120	84	44	0	0	4	1
VT	BURLINGTON	83	56	90	49	69	5	0.22	-0.58	0.20	0.48	29	9.67	74	86	32	1	0	3	0
VA	LYNCHBURG	77	52	87	43	65	-6	0.33	-0.47	0.31	2.74	170	18.32	102	97	48	0	0	3	0
	NORFOLK	79	60	86	51	69	-4	0.10	-0.75	0.10	0.85	50	12.70	85	85	51	0	0	1	0
	RICHMOND	80	57	85	48	68	-5	0.64	-0.16	0.57	1.90	119	15.80	86	91	48	0	0	3	1
	ROANOKE	75	56	86	47	66	-5	0.21	-0.53	0.15	2.11	140	14.31	80	86	53	0	0	3	0
	WASH/DULLES	80	53	85	43	66	-3	0.39	-0.55	0.35	0.88	47	14.37	81	95	49	0	0	3	0
WA	HANFORD	85	57	90	51	71	–	0.06	-0.03	–	0.34	155	3.46	115	52	24	1	0	2	0
	OLYMPIA	72	45	80	40	59	1	0.15	-0.26	0.13	1.02	121	34.76	139	94	47	0	0	2	0
	QUILLAYUTE	66	46	71	39	56	1	0.23	-0.53	0.20	1.94	118	67.06	127	98	59	0	0	3	0
	SEATTLE-TACOMA	69	51	76	48	60	0	0.11	-0.26	0.11	0.28	37	24.70	140	89	50	0	0	1	0
	SPOKANE	74	50	82	44	62	1	0.32	0.01	0.32	0.59	91	10.91	133	88	45	0	0	1	0
	YAKIMA	82	52	87	46	67	3	0.00	-0.14	0.00	0.61	218	3.06	79	71	28	0	0	0	0
WV	BECKLEY	71	53	79	42	62	-4	1.28	0.41	0.58	1.47	85	18.71	102	94	61	0	0	6	1
	CHARLESTON	78	57	82	49	67	-4	0.50	-0.30	0.20	2.18	136	20.13	109	95	58	0	0	5	0
	ELKINS	75	49	80	39	62	-2	0.92	-0.12	0.80	1.26	61	20.60	104	99	50	0	0	3	1
	HUNTINGTON	73	58	82	49	66	-3	1.71	0.96	0.70	2.01	131	18.61	98	98	67	0	0	5	1
WI	EAU CLAIRE	82	51	86	45	67	1	0.00	-0.99	0.00	0.57	29	7.29	61	90	30	0	0	0	0
	GREEN BAY	75	49	83	42	62	-1	0.15	-0.85	0.09	1.73	110	10.51	96	100	47	0	0	2	0
	MADISON	78	50	84	45	64	-2	0.00	-0.86	0.00	0.49	29	9.74	78	93	42	0	0	0	0
	MILWAUKEE	71	51	77	47	61	-3	0.02	-0.72	0.02	0.33	23	8.90	66	89	56	0	0	1	0
WY	CASPER	74	47	78	42	61	-1	0.80	0.45	0.33	1.04	141	5.81	89	96	49	0	0	7	0
	CHEYENNE	67	50	74	48	59	-1	0.91	0.41	0.37	1.50	149	6.82	104	96	56	0	0	5	0
	LANDER	71	50	74	47	60	-1	1.36	0.98	0.84	1.49	186	6.08	82	93	49	0	0	6	1
	SHERIDAN	72	53	75	47	62	2	0.92	0.36	0.43	1.61	138	7.08	93	96	61	0	0	4	0

Based on 1961-90 normals

Note: These data are preliminary and subject to change. In the past, precipitation totals from a number of stations have been incomplete.



While the Eastern and Central States waited for spring to arrive, the Southwest endured summer-like heat. In Des Moines, IA, the mercury climbed to 75°F on March 27, but failed to attain that level again until May 16. In some locations, including Birmingham, AL, March temperatures (59.5°F, warmest since 1974) actually averaged higher than April temperatures (58.2°F, coldest since 1983). Louisville, KY waited until an unprecedented date--May 18--for their first 80-degree reading of 1997. In Philadelphia, PA, a high of 88°F on May 19 left the city 1 day shy of its latest 80-degree reading, but was the only 80-degree maximum of the entire spring. Similarly, highs pushed above 70°F only once during the spring in Lansing, MI (78°F on May 24). In contrast, May-record heat baked Laughlin, NV (111°F) and Salt Lake City, UT (95°F) on the last day of meteorological spring.

Spring Weather Highlights

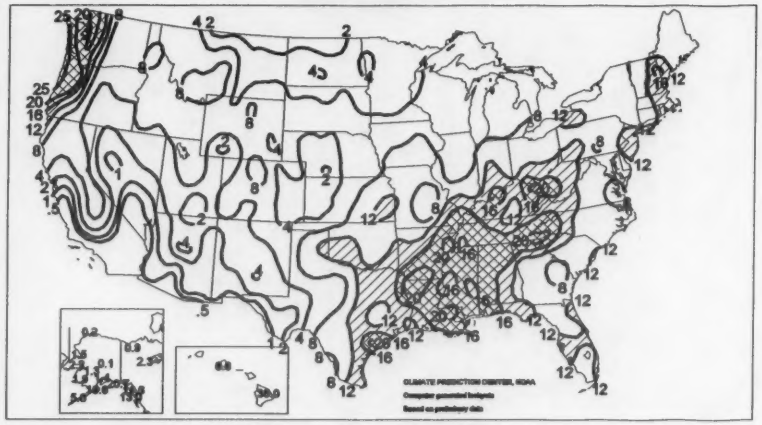
Despite a warm March nearly nationwide, spring temperatures averaged below normal in most areas east of the Continental Divide. Temperatures in the Central and Eastern States failed to return to normal levels after an early-April Plains blizzard. Preliminary data from the Climate Prediction Center indicated that April-May 1997 was one of the 10 coldest such periods during the last 103 years in 22 States, in an area bounded by Nebraska, New York, Georgia, and Texas. On April 11-13, a severe freeze damaged some jointing- to heading-stage winter wheat on the central and southern Plains. Frost plagued the Midwest and interior Northeast as late as May 20-22. In contrast, nearly unbroken warmth prevailed in the Southwest, resulting in spring departures of +2 to +5°F.

In early March, ferocious rains on already-saturated soils unleashed floodwaters on the Ohio Valley. Record crests were established on several tributaries in the middle Ohio Valley, while gauging stations from the West Virginia-Ohio border to the Mississippi River measured a top-10 flood. At mid-month, heavy rainfall and snowmelt caused flooding on Washington's Olympic Peninsula. Late in the month, widely anticipated snowmelt flooding unfolded in the James, Red, and upper Mississippi River basins. In eastern South Dakota, record crests on the James River occurred during the first 7 days of April. On the main-stem Mississippi River, from Anoka, MN to Lansing, IA, water levels peaked between April 10 and 15, exceeding those observed in June 1993, but remaining well below all-time records set in April 1965. The record-setting Red River crest arrived in Wahpeton, ND on April 15, reaching the Canadian border on April 28. In Grand Forks, ND, the Red River rose 5.3 feet higher than the 1979 record, inundating the city.

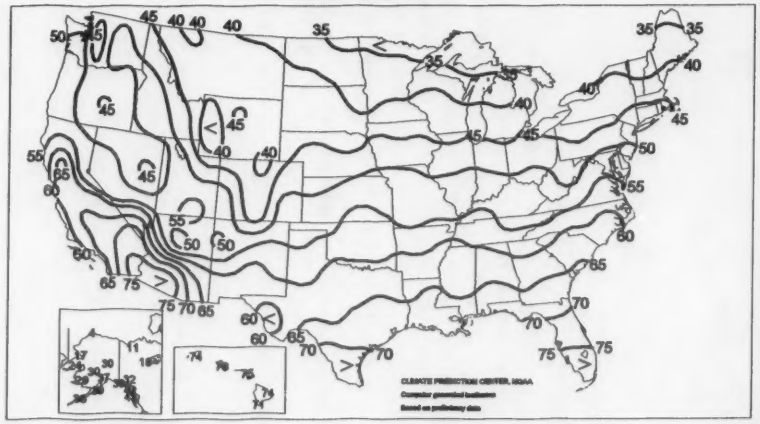
Spring began and ended with devastating tornado outbreaks. In Arkansas, 26 people died on March 1; in Jarrell, TX, 27 were killed on May 27. Nevertheless, April proved overall to be the month of dynamic storms, featuring the aforementioned Plains blizzard and a pair of classic New England winter storms (March 31-April 1 and April 18-19). April's stormy weather pattern continued into May, but ceded to a drier regime by May 4. Wet weather returned to much of the Nation during the latter half of May.

For the spring, precipitation topped 150 percent of normal at many locations in a broad arc from the Northwest to Texas and Louisiana. Above-normal totals were measured across the lower Mississippi and Ohio River Valleys. By spring's end, serious long-term drought was confined to the Southwest, while short-term (crop moisture) deficits were scattered across the West and the northern and central Plains. Little more than a month after the Red River flood, topsoil moisture across North Dakota declined markedly to unfavorably low levels.

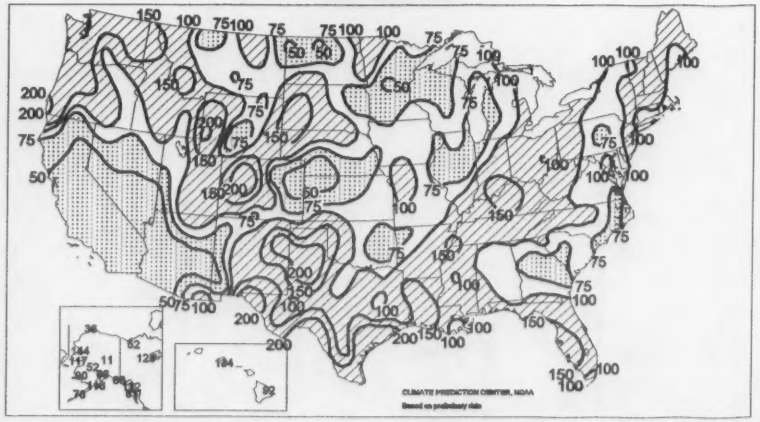
Spring Total Precipitation (inches)
MAR - MAY 1997



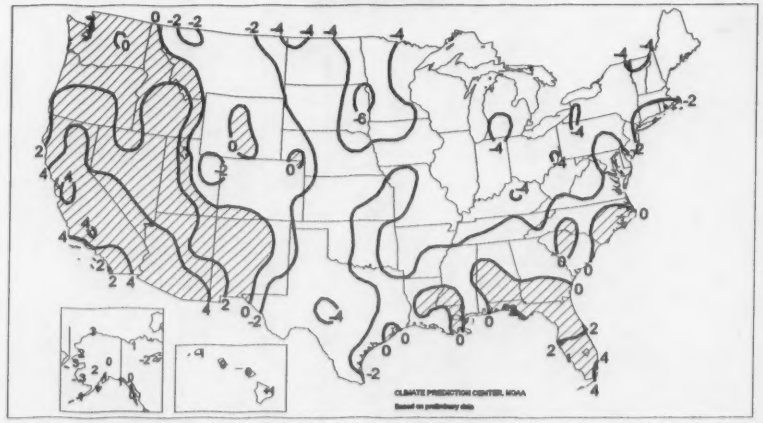
Spring Average Temperature (°F)
MAR - MAY 1997



Spring Percent of Normal Precipitation
MAR - MAY 1997



Spring Departure from Normal Average Temperature (°F)
MAR - MAY 1997



National Agricultural Summary

June 9 - 15, 1997

HIGHLIGHTS

Below-normal temperatures for the 10th consecutive week slowed crop development in an area extending from the central and southern Great Plains eastward to the Atlantic Coast. Soaking rains hindered winter wheat harvest and slowed planting operations throughout the southern Plains and Southeast. Flooding and ponding caused concern for spring planted crops in the Ohio and Tennessee Valleys. In the Southwest, a 7-week long hot spell ended as cooler weather provided favorable growing conditions for crops. Very warm, mostly dry weather across the northern United States dried soils. Above-normal precipitation, combined with mountain snowpack runoff, flooded low-lying fields along the upper Snake River in eastern Idaho. Rivers and streams in western Montana were also at high levels or overflowing.

Winter wheat: Warm, dry weather in the Northern States allowed winter wheat fields to head rapidly. Farmers in California, Georgia, and Texas made good harvest progress despite scattered showers. Harvest in Oklahoma was slowed by widespread precipitation and wet fields. Operators in Kansas were preparing for wheat harvest as 85 percent (%) of the crop was turning color and southern regions reported wheat ripening. Nationwide, the winter wheat crop was in mostly good to fair condition. Beneficial rains improved Colorado fields significantly. On the other hand, drier weather in North Carolina helped improve the winter wheat crop. Continued wet weather was an ongoing concern for winter wheat development in the Ohio and Tennessee Valleys .

Corn: Overall, the corn crop remained in mostly good condition. In Iowa and the northern Corn Belt, warmer weather helped corn growth but dried soils. Rains slowed fieldwork and caused localized flooding in southern Illinois. Continued rainfall in Indiana has crop progress falling behind normal. Replanting drowned areas will be necessary as weather allows. Crop condition in Nebraska declined as severe weather brought hail, high winds, and rain to counties in the south and east. Fields in Texas responded favorably to rains.

Soybeans: Soybean planting progressed to 89% complete, compared with 70% at this time last year and the 5-year average of 80%. Soybean planting was winding down in the Corn Belt. Planting in Kentucky and Tennessee remained well behind the average pace. In Iowa, soybeans emerged ahead of normal, but developed slowly due to dry soils. Farmers in the Ohio and Tennessee Valleys evaluated flooded fields for replanting. Showers slowed planting in the Delta. In Georgia, growers planted soybeans following winter wheat harvest.

Cotton: Cotton planting neared an end as 97% of the crop was in the ground. Seventeen percent of cotton fields were squaring by week's end, well behind 33% in 1996 and the average of 27%. Cotton squaring was behind the normal pace in all States except California and Arizona. Some cotton fields in the Texas Plains sustained heavy damage due to early-week hail and heavy rain. Replanting to alternative crops was necessary. Nationwide, cotton condition remained mostly good. Condition declined in the Delta as cool, wet weather significantly slowed progress.

Other Small Grains: Condition of the spring wheat, barley, and oat crops declined due to dry soils in the northern Plains and northern Corn Belt. Nearly all of the spring wheat crop was emerged, just ahead of both 1996 and the average. Spring wheat condition declined significantly as already dry fields in Minnesota, Montana, and North Dakota received minor amounts of precipitation. Barley emergence was also just ahead of 1996 and the average pace. Notable declines in Minnesota and North Dakota barley condition were partially offset by significant improvement in the South Dakota crop. Nationwide, 7% of the oat crop was headed, compared with 6% last year and the average of 14%. Overall, oat condition declined slightly but was still rated mostly good.

Other Crops: For the Nation, rice condition was rated mostly good. Crop condition declines in the Delta were offset by improvement in the Texas rice crop. Peanut planting advanced to 92% complete as Texas growers made good planting progress. Six percent of the crop was pegging by week's end. Nationwide, the peanut crop remained in mostly good condition. Sorghum growers in Kansas, New Mexico, and South Dakota planted 20% or more of their States' acreage during the week. Sorghum planting at the national level reached 85%, ahead of both the 80% planted in 1996 and the average of 76%. Planting in Oklahoma lagged significantly behind the normal pace.

Crop Progress and Condition

Week Ending June 15, 1997

Winter Wheat Percent Headed

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
AR	100	100	100	100
CA	99	99	99	99
CO	99	96	98	91
GA	100	100	100	100
ID	53	32	54	52
IL	95	90	94	97
IN	96	80	95	99
KS	100	100	100	100
MI	38	8	42	66
MO	100	98	99	100
MT	47	7	6	29
NE	94	86	91	94
NC	100	100	100	100
OH	86	50	85	95
OK	100	100	100	100
OR	98	82	94	95
SD	56	11	19	63
TX	100	100	100	100
WA	80	70	76	88
ALL	92	84	88	92

These 19 States produced 92% of the 1996 winter wheat crop.

Winter Wheat Percent Harvested

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
AR	10	6	25	32
CA	45	20	33	26
CO	0	0	0	0
GA	79	54	78	73
ID	0	0	0	0
IL	0	0	0	1
IN	0	0	0	0
KS	0	0	3	4
MI	0	0	0	0
MO	1	0	2	4
MT	0	0	0	0
NE	0	0	0	0
NC	24	17	31	28
OH	0	0	0	0
OK	7	1	60	29
OR	0	0	0	0
SD	0	0	0	0
TX	26	9	49	36
WA	0	0	0	0
ALL	5	2	15	11

These 19 States produced 92% of the 1996 winter wheat crop.

Soybeans Percent Planted

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
AL	66	61	76	76
AR	72	62	70	67
GA	76	64	75	71
IL	95	93	54	80
IN	93	89	43	82
IA	100	99	84	87
KS	95	80	78	66
KY	38	34	36	54
LA	84	83	92	86
MI	95	78	74	92
MN	99	98	97	92
MS	83	82	96	84
MO	78	71	56	62
NE	100	97	93	92
NC	55	53	56	62
OH	88	76	56	86
SC	63	48	63	59
SD	89	77	84	77
TN	41	38	46	58
ALL	89	84	70	80

These 19 States produced 94% of the 1996 soybean crop.

Sorghum Percent Planted

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
AR	100	99	100	98
CO	65	53	78	63
IL	77	75	48	64
KS	85	65	80	65
LA	98	97	100	97
MS	99	98	100	97
MO	86	77	77	76
NE	99	94	89	88
NM	90	67	28	53
OK	40	24	58	69
SD	65	41	71	71
TX	86	78	84	87
ALL	85	72	80	76

These 12 States produced 99% of the 1996 sorghum crop.

Spring Wheat Percent Emerged

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
ID	99	98	98	98
MN	96	82	92	96
MT	99	93	93	97
ND	95	87	89	94
SD	100	92	98	99
ALL	97	89	92	96

These 5 States produced 96% of the 1996 spring wheat crop.

Cotton Percent Planted

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
AL	100	99	100	99
AZ	100	100	100	100
AR	100	100	100	100
CA	100	100	100	100
GA	99	96	98	98
LA	100	100	100	100
MS	100	100	100	100
MO	100	100	100	100
NM	100	100	100	100
NC	100	100	100	100
OK	90	83	92	81
SC	99	98	100	100
TN	100	100	100	100
TX	93	83	86	88
ALL	97	92	94	95

These 14 States produced 99% of the 1996 cotton crop.

Cotton Percent Squaring

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
AL	14	3	40	31
AZ	76	60	73	68
AR	3	3	44	27
CA	45	35	31	19
GA	26	10	46	40
LA	18	8	52	49
MS	7	4	76	51
MO	3	0	27	12
NM	5	0	12	14
NC	5	0	13	8
OK	0	0	5	4
SC	11	10	25	16
TN	1	0	18	17
TX	16	11	19	20
ALL	17	11	33	27

These 14 States produced 99% of the 1996 cotton crop.

Barley Percent Emerged

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
ID	99	96	97	98
MN	99	88	88	95
MT	97	94	93	96
ND	96	88	91	94
SD	97	94	96	99
WA	100	99	99	100
ALL	97	91	93	96

These 6 States produced 82% of the 1996 barley crop.

Crop Progress and Condition

Week Ending June 15, 1997

Peanuts Percent Planted

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
AL	100	100	100	100
FL	100	98	100	NA
GA	100	98	100	100
NC	100	95	100	100
OK	88	79	93	82
SC	100	100	100	99
TX	65	38	76	56
VA	100	100	100	100
ALL	92	85	95	89

These 8 States produced 99% of the 1996 peanut crop.

Peanuts Percent Pegging

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
AL	5	NA	12	NA
FL	19	NA	46	NA
GA	11	NA	20	NA
NC	0	NA	1	NA
OK	0	NA	10	NA
SC	0	NA	0	NA
TX	1	NA	3	NA
VA	0	NA	0	NA
ALL	6	NA	13	NA

These 8 States produced 99% of the 1996 peanut crop.

Oats Percent Headed

	Jun 15 1997	Prev Week	Prev Year	5-Yr Avg
IA	17	NA	6	32
MI	2	NA	NA	NA
MN	1	NA	2	10
NE	22	NA	34	NA
ND	0	NA	0	2
OH	24	NA	1	26
PA	20	NA	23	15
SD	3	NA	NA	20
WI	2	NA	2	9
ALL	7	NA	6	14

These 9 States produced 54% of the 1996 oat crop.

Winter Wheat Crop Condition by Percent

	VP	P	F	G	EX
AR	3	18	42	30	7
CA	0	0	10	80	10
CO	2	9	21	56	12
GA	0	9	38	49	4
ID	0	3	17	63	17
IL	0	5	23	64	8
IN	1	4	29	55	11
KS	3	9	28	52	8
MI	2	7	29	44	18
MO	1	10	27	52	10
MT	1	9	26	48	16
NE	1	12	41	40	6
NC	1	3	27	65	4
OH	1	10	33	44	12
OK	7	10	28	52	3
OR	0	1	12	55	32
SD	7	14	33	38	8
TX	4	10	30	46	10
WA	0	0	9	61	30
ALL	3	9	27	51	10
Prev Wk	3	9	28	49	11
Prev Yr	15	25	30	24	6

Corn Crop Condition by Percent

	VP	P	F	G	EX
CO	0	1	17	68	14
GA	0	2	27	62	9
IL	1	3	24	60	12
IN	1	9	38	48	4
IA	0	4	23	58	15
KS	0	2	18	65	15
KY	1	16	46	31	6
MI	4	12	45	33	6
MN	0	10	40	41	9
MO	1	5	37	51	6
NE	0	1	24	61	14
NC	2	6	24	62	6
OH	3	10	34	43	10
PA	0	5	30	60	5
SD	0	2	18	63	17
TX	0	3	10	61	26
WI	0	4	25	59	12
ALL	1	5	28	54	12
Prev Wk	1	4	30	55	10
Prev Yr	2	9	33	48	8

Cotton Crop Condition by Percent

	VP	P	F	G	EX
AL	9	31	34	23	3
AZ	1	1	9	58	31
AR	3	17	54	25	1
CA	0	0	0	80	20
GA	0	7	34	54	5
LA	0	6	36	55	3
MS	3	9	30	50	8
MO	2	31	37	30	0
NM	1	4	21	69	5
NC	8	10	48	29	5
OK	0	5	9	75	11
SC	1	10	40	46	3
TN	6	17	35	41	1
TX	2	7	27	51	13
ALL	2	9	29	50	10
Prev Wk	1	9	31	50	9
Prev Yr	5	14	24	44	13

Oats Crop Condition by Percent

	VP	P	F	G	EX
IA	1	6	35	48	10
MI	0	9	40	41	10
MN	1	8	35	50	6
NE	0	3	24	57	16
ND	4	19	39	37	1
OH	0	8	37	49	6
PA	0	4	30	58	8
SD	1	0	17	66	16
WI	0	3	22	58	17
ALL	1	7	30	52	10
Prev Wk	0	5	31	55	9
Prev Yr	0	4	26	61	9

Peanuts Crop Condition by Percent

	VP	P	F	G	EX
AL	0	4	47	41	8
FL	0	1	10	84	5
GA	0	3	28	62	7
NC	0	5	19	72	4
OK	0	0	33	63	4
SC	0	0	20	54	26
TX	0	2	22	57	19
VA	0	5	45	45	5
ALL	0	3	29	59	9
Prev Wk	0	5	26	60	9
Prev Yr	0	3	31	60	6

(Continued on back cover)

State Agricultural Summaries

These summaries, issued weekly through the summer growing season, provide brief descriptions of crop and weather conditions important on a national scale. More detailed data are available in Weather and Crop Bulletins published each Monday by NASS State Statistical Offices in cooperation with the National Weather Service. The crop weather reports are also available on the Internet through the NASS Home Page on the World Wide Web at http://www.usda.gov/nass/ or from JAWF at http://www.usda.gov/oce/waob/jawf.

ALABAMA: Days suitable for fieldwork 3.1. Topsoil 9% short, 47% adequate, 44% surplus. Corn silked 32%, 31% 1996, 31% avg.; 3% poor, 26% fair, 64% good, 7% excellent. Wheat harvested 42%, 52% 1996, 45% avg.; 1% very poor, 2% poor, 72% fair, 23% good, 2% excellent. Livestock 2% poor, 21% fair, 64% good, 13% excellent. Wet soil, cool conditions slowed crop development.

ALASKA: Days suitable for fieldwork 6. Crop growth 10% slow, 60% moderate, 30% rapid. Small grain height 6.5 in. Potato emergence 15% compared to <5% in 1996. Most barley, oats in preboot or earlier stages. Haying is expected to begin by July 1. Topsoil 20% short, 80% adequate. Subsoil 35% short, 65% adequate.

ARIZONA: Below normal temperatures during the week slowed cotton development. Small grains 70% harvested, 82% 1996, 73% avg. Alfalfa harvest activity 39% light, 25% moderate, 36% active; 8% fair, 50% good, 42% excellent. Melon harvest was active in the central, western areas with cantaloupe, watermelon, honeydew, speciality melons being shipped. Potato harvest was active in the central area. Central area growers also harvested sweet corn, carrots. Iceberg lettuce harvest was complete in the eastern area; dry onion harvest gaining momentum. Citrus harvest coming to a close with the last of the Valencia oranges, grapefruit being picked. Grapes were harvested in the western, central areas.

ARKANSAS: Days suitable for fieldwork 5. Soil moisture 1% very short, 25% short, 65% adequate, 9% surplus. Main farming activities: Harvest of hay; soybean planting, weed control in pastures, rice flooding, fertilizing, herbicide application, wheat, oat harvest, cotton weed control, fertilization. Other farm activity included: Cattle treated for external parasites; Bermuda grass sprigging continuing.

CALIFORNIA: Field activities progressed normally under seasonable weather conditions in most areas. Harvest of wheat, barley and oats for grain was in full swing in the San Joaquin and Sacramento valleys and was winding down in the Imperial Valley. Light, midweek rainfall in the northern third of the state caused minor delays in the small grain harvest. Wheat and barley stubble fields were baled for straw or burned where conditions permitted. Late plantings of second crop corn continued in central and southern counties. Early planted corn was developing ears in the southern San Joaquin Valley. Rice was sprayed for broadleaf weeds in the Sacramento and San Joaquin valleys. Cotton was cultivated, irrigated, weeded and treated for aphids, lygus and mites. Some early planted pima fields were blooming in Kern County. Safflower, seed alfalfa were blooming in central, southern counties; some fields were treated for lygus, mites, weevils. Harvest of overwintered sugar beets was ongoing, while new crop fields were sprayed for worms. Garbanzo beans were drying for harvest in Fresno County. Alfalfa, oats, sudan grass were cut for hay or greenchopped. Some almonds, grapes were treated for mites. Flame Seedless grapes were beginning to show color in Fresno County. Cooler weather has aided stone fruit by limiting insect damage, split pit, and over maturity. The cherry harvest was nearly complete. Pistachios were treated to control mildew. Walnuts, apples and pears were treated for codling moth. Valencia orange harvest was nearly half complete. Fruit quality was good. Harvesting of grapefruit and lemons continued. Orange groves were treated for mites and scale. Broccoli and cauliflower harvests continued in the Salinas-Watsonville area. Lettuce was harvested along the central coast. Fresh tomato harvesting started in the San Joaquin and desert valleys. A few processing tomato fields were harvested in Fresno County; other fields were treated to control mildew. Sweet corn was harvested in Imperial County. Sweet corn growers in the San Joaquin Valley continued to plant, irrigate, and spray for worms. Cantaloups, honeydews, and watermelons were harvested in the Imperial and San Joaquin valleys. Kern County melons were sprayed for powdery mildew. Green bean harvest was complete in Merced County. Carrot harvest in Kern County progressed, while harvest in Imperial County was over. Sweet potatoes in Merced County were harvested. Onions were harvested in Kern and San Joaquin counties. Bell peppers were treated to control worms and aphids. Potatoes were harvested in Kern County. Potato planting was completed in the Tulelake-Butte Valley area. Pastures, rangeland in the northern portion of the State remained in good condition following last week's rainfall, with plenty of feed and water available for range animals. In the central portion of the state, rangeland and native pasture were drying rapidly, although grazing was still good at higher elevations. Southern ranges and pastures were very dry, with few cattle still on open range. Statewide, sheep and cattle were in good condition, with most range cattle on upper elevation pastures. Movement of cattle to sales yards and feedlots continued.

COLORADO: Days suitable for fieldwork 4.0. Topsoil 4% very short, 17% short, 73% adequate, 6% surplus. Subsoil 6% very short, 23% short, 67% adequate, 4% surplus. Spring barley 65% headed, 52% 1996, 25% avg.; 4% poor, 15% fair, 67% good, 14% excellent. Oats 35% headed, 26% 1996, 20% avg.; 4% poor, 15% fair, 68% good, 13% excellent. Corn 100% emerged, 99% 1996, 90% avg. Spring wheat 33% headed, 22% 1996, 12% avg.; 3% poor, 9% fair, 55% good, 33% excellent. Sorghum 31% emerged, 53% 1996, 33% avg.; 28% fair, 67% good, 5% excellent. Summer potatoes 100% emerged, 100% 1996, 96% avg.; 5% poor, 15% fair, 60% good, 20% excellent. Dry onion 1% poor, 10% fair, 78% good, 11% excellent. Sugar beets 60% thinned, 78% 1996, 52% avg.; 6% poor, 18% fair, 66% good, 10% excellent. Fall potatoes 55% emerged, 75% 1996, 59% avg. Dry beans 77% planted, 82% 1996, 53% avg.; 32% emerged, 62% 1996, 29% avg. Alfalfa 35% 1st cutting, 48% 1996, 31% avg. Winter wheat 99% headed, 98% 1996, 91% avg.; 27% turning color, 18% 1996, 15% avg. Livestock mostly in good to fair condition.

DELAWARE: Days suitable for fieldwork 5.6. Topsoil 13% short, 87% adequate. Subsoil 6% short, 94% adequate. Winter wheat 2% poor, 19% fair, 72% good, 7% excellent; 22% turned, 56% 1996, 44% avg. Barley 4% poor, 21% fair, 69% good, 6% excellent; 99% turned, 98% 1996, 99% avg.; 3% harvested, 5% 1996, 22% avg. Corn 97% planted, 98% 1996, 99% avg. Soybeans 41% planted, 34% 1996, 53% avg. Sorghum 29% planted, 45% 1996, 75% avg. Tomatoes 69% planted, 87% 1996, 95% avg. Watermelons 74% planted, 90% 1996, 95% avg. Cantaloupes 74% planted, 68% 1996, 90% avg. Cucumbers 47% planted, 47% 1996, 63% avg.; 2% harvested, 0% 1996, 0% avg. Snap beans 32% planted, 25% 1996, 60% avg. Sweet corn 81% planted, 91% 1996, 95% avg. Lima beans 15% planted, 21% 1996, 29% avg. Green peas 12% harvested, 40% 1996, 42% avg. Strawberries 53% harvested, 81% 1996, 84% avg. Market specialist said strawberry crop is best they've had in years. Apples 7% fair, 93% good. Peaches 5% fair, 93% good, 2% excellent. Hay supplies 12% short, 88% adequate. Clover, other hays 93% 1st cutting harvested, 85% 1996, 95% avg.; 7% 2nd cutting harvested, 2% 1996, 2% avg. Alfalfa 91% 1st cutting harvested, 86% 1996, 95% avg.; 4% 2nd cutting harvested, 0% 1996, 6% avg. Activities: very little rain, irrigation activity underway, barley harvest is starting up.

FLORIDA: Topsoil moisture was short to adequate throughout the Panhandle and northern Peninsula, with scattered areas having surplus moisture. Moisture in southern Peninsula was adequate to surplus. One hundred percent of peanuts were planted. Nineteen percent of peanuts were pegged. Cotton planting was virtually complete. Soybean planting was active. Sugarcane growth was normal. Cotton growth was slow due to cooler-than-normal weather. Peanuts were poor 1%, fair 10%, good 84%, and excellent 5%. Tomato harvest continued to be active in northern

areas. In the southern areas, most harvesting of vegetable crops was over. Some local sales continue. Major vegetables shipped were watermelons, tomatoes, sweet corn, peppers, and cucumbers. Summer rains are needed in all areas, for lakes, ponds, and streams to refill. New growth was showing on young trees and a few older ones. New crop fruit made good progress. Little green fruit have generally stopped dropping. Valencia oranges and seedless grapefruit in good condition remain to be picked. Valencia harvest was slowing as supplies were running out. Grapefruit harvest was almost over. Caretakers were cutting cover crops, spraying, fertilizing, and herbiciding. Pasture feed was fair 20%, good 65%, and excellent 15%. Condition of cattle herds was fair 20%, good 65%, and excellent 15%. Pasture range was in fair to excellent condition. Recent rain showers significantly improved permanent pastures. Condition of cattle on mend is due to improved pasture conditions.

GEORGIA: Days suitable for fieldwork 4.8. Soil moisture 3% very short, 15% short, 65% adequate, 17% surplus. Corn 66% silked, 48% 1996, 57% avg.; 15% dough, 8% 1996, 21% avg. Hay 7% poor, 34% fair, 56% good, 3% excellent. Peanuts 39% blooming, 55% 1996, 46% avg. Sorghum 4% poor, 23% fair, 71% good, 2% excellent; 78% planted, 83% 1996, 82% avg. Soybeans 3% poor, 29% fair, 65% good, 3% excellent. Tobacco 1% very poor, 5% poor, 36% fair, 56% good, 2% excellent; 3% harvested, 1% 1996, 1% avg. Watermelons 7% poor, 29% fair, 60% good, 4% excellent; 4% harvested, 3% 1996, 5% avg. Apples 2% poor, 72% fair, 18% good, 8% excellent. Peaches 16% poor, 24% fair, 34% good, 26% excellent; 53% harvested, 45% 1996, 46% avg. Pecans 3% poor, 24% fair, 63% good, 10% excellent. Activities: Cool evening temperatures along with scattered showers hindered planting, spraying, cultivation, harvesting. Corn conditions decreased slightly. Cotton planting remains on schedule, conditions show improvement. Hay harvest delayed by wet fields, damp weather. Soybean planting as weather permitted. Disease concerns continue on tobacco, vegetables, pecans. Spraying of fungicides active. Wheat harvest active, slightly ahead of normal. Other activities included harvesting, spraying, marketing vegetables; planting few fields of late cotton, planting soybeans following small grains, mowing pastures.

HAWAII: Gusty winds at midweek caused some bruising. Increased shower activity helped crops. Overall condition fair. Papaya production light. Watermelon production heavy, further increase expected. Sweet corn heavy, slow market some areas. Head cabbage lower. Dry onion good condition. Ginger root harvest still active

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IDAHO: Days suitable for fieldwork 3.5. Topsoil 26% surplus, 68% adequate, 6% short. Flooding destroyed crops in low lying areas of the Upper Snake River valley. Affected acreage is unknown. First cutting of hay is of poor quality due to frequent rains. Spring wheat jointed 74%, booted 45%. Barley jointed 62%, booted 30%. Winter wheat booted 83%. Potatoes emerged 80%, 78% 1996, 79% avg.; 12 inches high 19%, 11% 1996, 14% avg.; 30% excellent, 57% good, 13% fair. Alfalfa hay harvested (1st cutting) 39%, 46% 1996, 51% avg. Corn emerged 97%, 96% 1996, 94% avg. Dry beans planted 89%, 87% 1996, 85% avg.; emerged 66%, 65% 1996, 58% avg. Dry peas emerged 98%, 80% 1996, 94% avg. Lentils emerged 99%, 82% 1996, 96% avg. Oats emerged 97%, 90% 1996, 95% avg. Irrigation water supply 68% excellent, 32% good. Activities: Watching high water, weed control, trying to bale alfalfa, planting dry beans, irrigating.

ILLINOIS: Days suitable for fieldwork 3.0. Topsoil 6% short, 58% adequate, 36% surplus. Rains slowed fieldwork across most of the south last week. Localized areas of drowned out, flooded fields were reported in the south. Rainfall in other areas of the State ranged from light showers to more than two inches. Rains delayed hay harvest during most of last week, spraying of post emergence herbicides was common. The continued wet weather is an ongoing concern in the wheat growing region in the south. Farmers were also busy last week cultivating, mowing roadsides, readying combines for wheat harvest. Corn height 11 in., 9 in. 1996, 11 in. avg. Wheat filled 80%, 70% 1996, 87% avg.; turning yellow 27%, 29% 1996, 48% avg.; ripe less than 1%, 2% 1996, 6% avg. Oats headed 27%, 19% 1996, 46% avg.; filled 9%, 8% 1996, 17% avg.; turning yellow less than 1%, 0% 1996, 2% avg. Oats 1% poor, 18% fair, 66% good, 15% excellent. Alfalfa hay 1st cutting 75%, 42% 1996, 74% avg.; 2nd cutting 1%, 1% 1996 3% avg.; 3% poor, 27% fair, 61% good, 9% excellent. Red clover hay cutting 45%, 37% 1996, 62% avg.; 1% poor, 17% fair, 73% good, 9% excellent. Soybeans 5% poor, 28% fair, 60% good, 7% excellent.

INDIANA: Days suitable for fieldwork 1.8. Topsoil 42% adequate, 58% surplus. Subsoil 50% adequate, 50% surplus. Continued rainfall has crop progress falling behind normal. Replanting drowned out areas will be necessary as weather allows. Range, pasture feed 1% very poor, 3% poor, 27% fair, 57% good, 12 excellent. First cutting of alfalfa 36% complete. Transplanting of tobacco 45% complete. Activities: Scouting fields, soybean planting, replanting, corn replanting, cutting hay, applying herbicide, applying nitrogen to corn, caring for livestock.

IOWA: Days suitable for fieldwork 5.9. Topsoil very short 3%, short 35%, adequate 56%, surplus 6%. Subsoil very short 1%, short 11%, adequate 84%, surplus 4%. Warmer temperatures have helped corn growth, many areas need rain for the topsoil. Soybeans emerged ahead of normal, development is slow due to dry conditions. Some areas received heavy rains while other areas received little this week. Alfalfa hay 1st harvest 61%, 22% 1996, 48% avg. Corn cultivated 1st time 13%, 12% 1996, 32% avg.; stand 93% of normal. Soybeans emerged 96%, 65% 1996, 73% avg.; replanted or to be replanted 4%. Oats headed 17%, 6% 1996, 32% avg. Winter wheat headed approx. 60%. Corn 4% poor, 23% fair, 58% good, 15% excellent. Hay 2% very poor, 24% poor, 40% fair, 29% good, 5% excellent. Oats 1% very poor, 6% poor, 35% fair, 48% good, 10% excellent. Pasture feed 2% very poor, 14% poor, 37% fair, 39% good, 8% excellent. Winter wheat 2% very poor, 5% poor, 19% fair, 61% good, 13% excellent. Livestock are reported in good condition. Producers are most concerned about the short hay crop, dry pastures.

KANSAS: Days suitable for fieldwork 4.4. Topsoil 1% very short, 13% short, 72% adequate, 14% surplus. Subsoil 2% very short, 12% short, 79% adequate, 7% surplus. Wheat turning 85%, 74% 1996, 76% avg. Operators preparing combines for wheat harvest. Barley yellow dwarf, wheat streak mosaic, leaf rust diseases reported. Southern regions reporting fields ripening. Sorghum 1% poor, 20% fair, 73% good, 6% excellent. Soybean 1% poor, 22% fair, 69% good, 8% excellent. Sunflowers 5% poor, 21% fair, 72% good, 2% excellent. Sunflowers planted 62%, no historic data available. First cut alfalfa hay 95%, 89% 1996, 88% avg.; second cut alfalfa 15%, 3% 1996, 7% avg. Pasture feed 4% poor, 20% fair, 67% good, 9% excellent. Stock water supplies 1 % very short, 6% short, 88% adequate, 5% surplus. Chinch bugs continue to be of concern in corn. Major field activities included planting fall crops, cutting hay, preparing for wheat harvest. Livestock reported as gaining well.

KENTUCKY: Days suitable for fieldwork 1.0. Topsoil 15% adequate, 85% surplus. Subsoil 23% adequate, 77% surplus. Scattered showers throughout the week kept the soil saturated. Temperatures below normal for the tenth consecutive week. Very little field activity. Burley tobacco set 45%, 65% 1996, 84% avg. Dark tobacco 57% set. Set tobacco 2% very poor, 16% poor, 46% fair, 32% good, 4% excellent. Disease, insects, plant size are concerns for tobacco. Ponding water causing damage to corn in low lying areas. Producers may convert poor corn stands to sorghum or soybeans in wet areas. Emerged corn 1% very poor, 16% poor, 46% fair, 31% good, 6% excellent. Winter wheat 9% poor, 35% fair, 46% good, 10% excellent. Pasture feed 1% very poor, 4% poor, 25% fair, 51% good, 19% excellent. Barley harvest underway. Most of the hay crop very mature, too wet to cut. Warm, sunny weather urgently needed.

LOUISIANA: Days suitable for fieldwork 3.9. Soil moisture 6% short, 63% adequate, 31% surplus. Corn 1% poor 14% fair, 56% good, 26% excellent; 46% silked, 89% 1996, 74% avg.; 12% dough, 24% 1996, 26% avg. Growth progressed rapidly with the higher temperatures. Cotton 0% setting bolls, 0% 1996, 2% avg. Hay 81% 1st cutting, 77% 1996, 76% avg. Peaches 39% fair, 60% good 1% excellent; 36% harvested, 30% 1996, 24% avg. Rice 100% emerged, 100% 1996, 99% avg.; 1% headed, 3% 1996, 8% avg. Growers were busy scouting fields for sheath blight, water weevils. Weed control was active. Sorghum 3% poor, 32% fair,

60% good, 5% excellent; 92% emerged, 100% 1996, 95% avg.; 0% headed, 4% 1996, 4% avg. Soybeans 5% poor, 31% fair, 57% good, 7% excellent; 72% emerged, 89% 1996, 80% avg. Planting progressed slowly because of showers. Some fields were replanted. Spring plowing 99% plowing, 100% 1996, 99% avg. Sugarcane 7% poor, 22% fair, 47% good, 24% excellent. Lay-by operations were active in between rains. Sweet potatoes 55% planted, 64% 1996, 58% avg. Planting was active. Wheat 89% harvested, 98% 1996, 91% avg. Livestock 4% poor, 31% fair, 57% good, 8% excellent. Vegetables 9% poor, 39% fair, 45% good, 7% excellent.

MARYLAND: Days suitable for fieldwork 5.5. Topsoil 1% very short, 23% short, 68% adequate, 8% surplus. Subsoil 2% very short, 20% short, 72% adequate, 6% surplus. Winter wheat 3% very poor, 8% poor, 25% fair, 44% good, 20% excellent; 38% turned, 35% 1996, 51% avg. Rye 1% poor, 9% fair, 68% good, 22% excellent; 76% turned, 52% 1996, 64% avg.; 8% harvested, 0% 1996, 7% avg. Barley 3% very poor, 4% poor, 25% fair, 42% good, 26% excellent; 84% turned, 92% 1996, 95% avg.; 13% harvested, 8% 1996, 14% avg. Field corn 100% planted, 97% 1996, 98% avg. Soybeans 60% planted, 49% 1996, 59% avg. Sorghum 61% planted, 34% 1996, 66% avg. Apples 3% very poor, 6% poor, 6% fair, 69% good, 16% excellent. Peaches 50% very poor, 2% poor, 32% fair, 15% good, 1% excellent. Cantaloupe 94% planted, 94% 1996, 96% avg. Sweet corn 91% planted, 90% 1996, 91% avg. Watermelons 97% planted, 91% 1996, 97% avg. Tomatoes 97% planted, 95% 1996, 93% avg. Cucumbers 77% planted, 88% 1996, 86% avg. Tobacco 83% transplanted, 91% 1996, 83% avg. Green peas harvested 32%, 27% 1996, 52% avg. Strawberries 55% harvested, 67% 1996, 74% avg. Hay 7% very short, 11% short, 78% adequate, 4% surplus. Alfalfa hay 87% 1st cutting, 77% 1996, 90% avg.; 9% 2nd cutting, 13% 1996, 9% avg. Clover, other hays 60% 1st cutting harvested, 60% 1996, 75% avg.; 5% 2nd cutting, 3% 1996, 2% avg. Activities: Side dressing of corn is near completion, continued planting of soybeans.

MICHIGAN: Many crops benefited from these weather conditions, and farmers used the good weather to complete fieldwork. There was little precipitation across the State, leaving topsoil a bit dry in some areas. Topsoil 10% very short, 41% short, 47% adequate, 2% surplus. Subsoil 5% very short, 24% short, 66% adequate, 5% surplus. Potatoes planted 97% 1997, 96% 1996, 98% avg. Asparagus harvested 70% 1997, 78% 1996, 88% avg. Dry beans planted 78% 1997, 17% 1996, 58% avg. All hay 1st cutting harvested 30% 1997, 15% 1996, 36% avg.

MINNESOTA: Days suitable for fieldwork 6.7. Topsoil 29% very short, 41% short, 30% adequate. Corn 99% emerged, 96% 1996, 95% avg.; 32% cultivated, 17% 1996, 35% avg.; 8 in. height, 5 in. 1996, 9 in. avg. Soybeans 99% planted, 97% 1996, 92% avg.; 93% emerged, 76% 1996, 79% avg.; 12% cultivated, 4% 1996, 15% avg.; 3 in. height, 2 in. 1996, 4 in. avg. Spring wheat 98% emerged, 92% 1996, 96% avg.; 22% jointed, 16% 1996, 46% avg.; 0% headed, 1% 1996, 6% avg. Oats 99% emerged, 98% 1996, 98% avg.; 49% jointed, 37% 1996, 56% avg.; 1% headed, 2% 1996, 10% avg. Barley 99% emerged, 88% 1996, 95% avg.; 18% jointed, 14% 1996, 46% avg.; 0% headed, 2% 1996, 5% avg. Sweet corn 89% planted, 85% 1996, 86% avg. Potatoes 99% planted, 92% 1996, 96% avg. Flaxseed 96% planted, 91% 1996, 93% avg. Dry edible beans 98% planted, 91% 1996, 93% avg. Sunflowers 99% planted, 91% 1996, 95% avg. Alfalfa 55% 1st cutting , 45% 1996, 55% avg. Pasture feed 12% very poor, 25% poor, 38% fair, 24% good, 1% excellent. Spring wheat 2% very poor, 13% poor, 28% fair, 40% good, 17% excellent. Barley 1% very poor, 9% poor, 33% fair, 48% good, 9% excellent. Corn 10% poor, 40% fair, 41% good, 9% excellent. Oats 1% very poor, 8% poor, 35% fair, 50% good, 6% excellent. Sugar beets 1% very poor, 10% poor, 29% fair, 43% good, 17% excellent. Soybeans 3% very poor, 9% poor, 36% fair, 43% good, 9% excellent.

MISSISSIPPI: Days suitable for fieldwork 1.9. Soil moisture 43% adequate, 57% surplus. Corn 100% emerged, 100% 1996, 100% avg.; 16% silked, 30% 1996, 32% avg.; 3% dough, 3% 1996, 5% avg.; 6% poor, 25% fair, 57% good, 12% excellent. Soybeans 83% planted, 96% 1996, 84% avg.; 74% emerged, 94% 1996, 76% avg.; 8% blooming, 14% 1996, 3% avg.; 1% very poor, 6% poor, 30% fair, 51% good, 12% excellent. Wheat 61% mature, 99% 1996, 97% avg.; 16% harvested, 66%1996, 51% avg.; 1% very poor, 7% poor, 37% fair, 45% good, 10% excellent. Peaches 17% harvested, 27% 1996, 27% avg.; 1% poor, 17% fair, 63% good, 19% excellent. Peanuts 100% planted, 100% 1996, 94% avg.; 5% fair, 95% good. Sweet potatoes 18% planted, 37% 1996, 59% avg.; 10% poor, 1% fair, 88% good, 1% excellent. Hay 89% harvested (cool season), 95% 1996, N/A avg.; (warm season), 21% harvested, 30% 1996, N/A avg.; 1% very poor, 6% poor, 38 fair, 46% good, 9% excellent. Watermelons 95% planted, 100% 1996, 97% avg.; 3% very poor, 10% poor, 34% fair, 43% good, 10% excellent. Blueberries 6% poor, 17% fair, 60% good, 17% excellent. Cattle 1% poor, 19% fair, 61% good, 19% excellent. Pasture feed 4% poor, 20% fair, 55% good, 21% excellent. Activities: Due to wet weather, limited farming activities. Dry conditions are needed in order for cotton producers to side dress with nitrogen. Replanting of sorghum, soybeans will be necessary in some areas.

MISSOURI: Days suitable for fieldwork 4.4, 3 days in the northeast to 7 days in northwest. Topsoil 15% short, 67% adequate, 18% surplus. Surplus moisture reported in many fields in the northeastern, east-central southeastern districts. Warmer weather needed for all crops. Bean planting most advanced in the northwest, north central, central districts with over 90% planted, least advanced southwest, southeastern districts at 77%. Sorghum planting most advanced in northwestern, southeastern districts with 94% or more planted, least advanced northeast at 65%. Wheat coloring ranges from 21% northeast to 100% southeast. First crop alfalfa 74%, 63% 1996, 68% avg. Other hay 39%,32% 1996, 38% avg. Pasture feed 1% very poor, 8% poor, 32% fair, 54% good, 5% excellent.

MONTANA: Days suitable for fieldwork 3.5. Topsoil 14% very short, 14% short, 54% adequate, 18% surplus. Subsoil 11% very short, 21% short, 58% adequate, 10% surplus. Precipitation over most of the State has helped subsoil moisture, pasture condition, hay crop. Some areas of State reported flooding of rivers, fields while other areas are still too dry. Oats emerged 95%, 89% 1996, 94% avg.; 6% very poor, 9% poor, 39% fair, 40% good, 6% excellent. Sugar beets 100% emerged, 100% 1996. Corn 98% emerged, 89% 1996. Potatoes emerged 71%, 77% 1996. Dry beans emerged 100%, 85% 1996. Cattle moved to summer pasture 92%, 95% 1996, 91% avg.; sheep moved 89%, 95% 1996, 90% avg.

NEBRASKA: Days suitable for fieldwork 5.4. Subsoil 15% short, 83% adequate, 2% surplus. Topsoil 2% very short, 22% short, 73% adequate, 3% surplus. Dry weather conditions for much of last week allowed producers to virtually complete soybeans and sorghum planting. However, topsoil moisture supplies were becoming short in many east central, southeastern counties. Severe weather on June 11 brought hail, high winds and rain to counties in parts of the south, east. Winter wheat 1% very poor, 12% poor, 41% fair, 40% good, 6% excellent; 94% headed, 91% 1996, 94% avg.; 6% turning color, 12% 1996, 26% avg. Corn 1% poor, 24% fair, 61% good, 14% excellent; some producers in north had replanted due to cutworm damage. Soybeans 2% poor, 26% fair, 62% good, 10% excellent; 94% emerged, 69% 1996, 74% avg. Sorghum 3% poor, 45% fair, 45% good, 7% excellent; 99% planted, 89% 1996, 88% avg.; 90% emerged, 52% 1996, 67% avg. Oats 3% poor, 24% fair, 57% good, 16% excellent. Dry bean 80% planted, 81% 1996, 73% avg.; 29% emerged, 45% 1996, 42% avg. Alfalfa 4% very poor, 11% poor, 35% fair, 41% good, 9% excellent; 52% 1st cutting, 60% 1996, 68% avg; reports in east central indicated that the first cutting was short. Wild hay 1% very poor, 8% poor, 31% fair, 54% good, 6% excellent. Pasture feed, range 8% poor, 24% fair, 59% good, 9% excellent; Other activities; cultivating row crops, applying chemicals, moving grain to market.

NEVADA: Haying continued between thunderstorms, much hay was damaged by rains. First cutting of alfalfa was underway north, while growers in the extreme south were preparing for their third cutting. Fall seeded grains were heading, while development of spring seeded crops was slowed somewhat by the cooler temperatures. Grain crop condition ratings fair to good. Corn acreage showing good growth, reaching 12

inches high in some fields. Onions, garlic, potatoes in good condition. Rains aided drying ranges. Main farm, ranch activities: Alfalfa hay harvest, irrigating, spraying.

NEW ENGLAND: Days suitable for fieldwork 6.3. Topsoil 1% very short, 29% short, 67% adequate, 3% surplus. Subsoil 1% very short, 20% short, 74% adequate, 5% surplus. Pasture feed 5% poor, 35% fair, 51% good, 9% excellent. Massachusetts potatoes: 100% planted, 100% 1996, 99% avg., 85% emerged; condition good. Rhode Island potatoes: 100% planted, 100% 1996, 100% avg., 90% emerged; condition good to excellent. Maine potatoes: 99% planted, 100% 1996, 99% avg.; 5% emerged; condition good. Field corn: 95% planted, 90% 1996, 95% avg.; 70% emerged; condition good to fair. Sweet corn: 80% planted, 90% 1996, 90% avg.; 70% emerged; condition good to fair. Oats in Maine: 95% planted, 100% 1996, 99% avg.; 65% emerged; condition good. Barley in Maine: 95% planted, 100% 1996, 65% emerged.; condition good. Shade tobacco: 100% planted, 100% 1996, 100% avg.; condition good. Broadleaf tobacco: 60% planted, 40% 1996, 70% avg.; condition good. Hay: 35% harvested, 25% 1996, 40% avg.; condition good to fair. Cranberries in bud stage; fruit set average; condition good. Highbush blueberries petal fall; fruit set average; condition good. Wild blueberries reported in full bloom; condition good. Strawberries petal fall to full bloom; fruit set average; fruit size average; condition good. Pears in petal fall; fruit set average; fruit size average; condition good. Apples petal fall; fruit set average to below average; fruit size average to below average; condition good. Peaches in petal fall; fruit set below average to average; fruit size below average to average; condition good to fair. Warm, dry week allowed planting progress to move on schedule with last year and normal. Farmers were busy with first mowing of hay fields. Major farm activities: Planting field corn, potatoes, sweet corn, chopping grass, fertilizing.

NEW JERSEY: Days suitable for fieldwork 6. Topsoil short to adequate. Cooler than normal temperatures continue, causing the delay of some vegetable, fruit crops as well as limiting the effectiveness of some herbicides. Farmers are busy implementing pest control measures, irrigating, planting, harvesting. Planting tomatoes, snap beans. Also, starting to plant late summer items after the spring crop has been harvested. Harvesting of lettuce (all types), asparagus, spinach, leeks, herbs, parsley, turnips, endive, escarole, beets, cabbage (all types), peas, kale, pickles, fava beans, squash, Swiss chard. Cutting, baling of hay continues. Wheat, barley are starting to brown. Pastures reported in good condition. Peaches, apples, blueberries are sizing well. Some thinning of peaches reported. Cranberries are blooming. Harvesting of strawberries continues.

NEW MEXICO: Days suitable for fieldwork 6.2. Topsoil 1% very short, 12% short, 85% adequate, 2% surplus. Planting of sorghum continued well ahead of schedule; 90% complete, 28% 1996, 53% avg. Afternoon thunderstorms continued to slow hay harvest with 1st cutting of alfalfa 93% complete; 2nd cutting 47% complete. Alfalfa 1% very poor, 2% poor, 25% fair, 65% good, 7% excellent. Wheat harvest was underway with condition 1% very poor, 2% poor, 14% fair, 75% good, 8% excellent. Onion harvest continued with 20% complete; 6% fair, 70% good, 24% excellent. Below normal temperatures statewide slowed crop progress slightly, conditions remained mostly fair to good. Chile 1% very poor, 3% poor, 27% fair, 66% good, 3% excellent; corn 9% fair, 81% good, 10% excellent. Cotton 1% very poor, 4% poor, 21% fair, 69% good, 5% excellent; 5% squaring, 12% 1996, 14% avg. Cattle, sheep continued to be in fair to good condition.

NEW YORK: Days suitable for fieldwork 6.6. Soil moisture 13% very short, 47% short, 40% adequate. Pasture feed 4% poor, 73% fair, 23% good. Corn 92% seeded, 88% 1996, 93% avg. Dry beans 20% planted, 50% 1996. Soybeans 79% planted. First cut alfalfa 46% complete, 40% avg. Clo-tim 40% harvested, 22% 1996, 33% avg. Wheat good. Hudson Valley fruit in good condition. Apples sizing nicely. Growers across the State busy mowing, cultivating, applying water. Lake Erie grapes two weeks from bloom. Warmer weather helped vegetable crops. Strawberry picking started. Sweet corn planting slightly behind schedule.

NORTH CAROLINA: Statewide, 5.2 days were suitable for fieldwork. Continuing cold weather is slowing the growth of many crops. Days suitable for fieldwork improved, but rain and localized reports of hail kept farmers from having a full week of work. Reports of blue mold continue, severity of the disease is uncertain. Soil moisture 4% very short, 21% short, 63% adequate, 12% surplus. Activities for the week included: Planting sorghum, soybeans, sweet potatoes, Burley tobacco; fertilizer, herbicide applications on corn; harvesting small grains, Irish potatoes, peaches; cutting hay; maintaining pastures; tending livestock; repairing equipment; general farm maintenance.

NORTH DAKOTA: Days suitable for fieldwork 7. Scattered rain showers brought some needed rain, however more precipitation is needed to aid crop development. Topsoil moisture supplies: 29% very short, 44% short, 26% adequate, 1% surplus. Subsoil moisture supplies: 6% very short, 29% short, 64% adequate, 1% surplus. Dry soil conditions continue to hinder crop development, though small grain development remains ahead of last year. Durum wheat 94% emerged and beyond, 11% jointing and beyond; 85%, 4% 1996, 91%, 22% avg. Late season crops: canola 80% emerged and beyond, 10% rosette and beyond; corn 95% emerged and beyond; 93% 1996, 93% avg.; dry edible beans 88% emerged and beyond; 68% 1996, 83% avg.; flaxseed 87% emerged and beyond; 75% 1996, 80% avg.; potatoes 64% emerged and beyond; 71% 1996, 80% avg.; soybeans 92% emerged and beyond; 76% 1996, 87% avg.; sugar beets 97% emerged and beyond; 99% 1996, 99% avg.; sunflower 79% emerged and beyond; 68% 1996, 75% avg. Conditions of all crops deteriorated during the week despite reports of rain. Emerged crop condition: durum 4% very poor, 23% poor, 37% fair, 35% good, 1% excellent; canola 8% very poor, 23% poor, 34% fair, 32% good, 3% excellent; corn 1% very poor, 5% poor, 17% fair, 67% good, 10% excellent; dry edible beans 1% very poor, 2% poor, 28% fair, 64% good, 5% excellent; flaxseed 3% very poor, 14% poor, 35% fair, 45% good, 3% excellent; potatoes 33% fair, 61% good, 6% excellent; soybeans 2% poor, 17% fair, 65% good, 16% excellent; sugar beets 5% poor, 29% fair, 63% good, 3% excellent; sunflower 1% very poor, 8% poor, 26% fair, 60% good, 5% excellent. Pasture feed 15% very poor, 39% poor, 30% fair, 14% good, 2% excellent.

OHIO: Days suitable for fieldwork 5.0 days. Topsoil 3% short, 75% adequate, 22% surplus. There was a sigh of relief as the growers took full advantage of the weather by increasing their planting, haying, harvesting progress. Corn 95% emerged, 63% 1996, 89% avg. Most districts are above 90% corn emerged. Growers increased soybean planting by 12 points from the previous week, 2 days ahead of the avg. Soybeans 69% emerged, 33% 1996, 71% avg. Soybean emergence most advanced in the Central district. Oats headed jumped 21 points from the previous week, about one day behind the avg. Winter wheat headed up 36 points from last week, 4 days behind avg. Most of the districts are above 80% winter wheat headed. Winter wheat 3% turning color, 5% 1996, 17% avg. All hay cutting progress soared 30 plus points since the previous week. Alfalfa hay 52% 1st cutting, 31% 1996, 71% avg. Other hay 37% 1st cutting, 20% 1996, 54% avg. Processing tomatoes 78% transplanted, 94% 1996, 94% avg. Strawberries 12% harvested, 22% 1996, 32% avg. Growers throughout the State were busy chopping, mowing, baling hay; planting, replanting corn, soybeans; applying pesticides, herbicides, fertilizer; side dressing, cultivating corn; preparing the ground. Other activities included crop scouting, repairing tile, fence maintenance. Some parts of the State, farmers were setting tomatoes, transplanting vegetables. Some reports of farmers harvesting cabbage in southern areas. The low lying ponding areas are starting to recede, some growers are still debating whether or not to replant. Some of the crops in the water saturated areas are looking better than anticipated. Some growers were not as lucky, as they are spot replanting their fields. One reporter mentioned brown spots in some soybeans. The conditions for the corn, hay, pasture, and winter wheat varied slightly, while oats decreased from the previous week. Soybeans 3% very poor, 13% poor, 36% fair, 39% good, 9% excellent. Hay 2% very poor, 6% poor, 36% fair, 49% good, 7% excellent. There was a report of insects being noted in fields in southeastern area. Some of these pests were European Corn Borer, Cucumber Spotted, Stripped Beetle, Colorado Potato Beetle, and Aphids. Slugs are causing problems

in southern States strawberries. Livestock was reported in good condition. There were reports of increased fly activities around the livestock.

OKLAHOMA: Days suitable for fieldwork 4.1. Topsoil 9% short, 77% adequate, 14% surplus. Subsoil 6% short, 86% adequate, 8% surplus. Wheat harvest, row crop activity slowed by wet fields. Wheat 87% soft dough, 99% 1996, 95% avg.; Oats 88% soft dough, 93% 1996, 86% avg.; 7% harvested, 32% 1996, 16% avg. Corn 1% tasseling, 13% 1996, 12% avg. Sorghum 26% up-to-stand, 40% 1996, 54% avg. Soybeans 68% planted, 87% 1996, 61% avg.; 59% up-to-stand, 62% 1996, 45% avg. Peanuts 88% planted, 93% 1996, 82% avg.; 76% up-to-stand, 78% 1996, 65% avg.; 0% pegging, 10% 1996, 3% avg. Cotton 75% up-to-stand, 80% 1996, 66% avg. Alfalfa hay 31% 2nd cutting, 31% 1996, 24% avg. All other hay 57% 1st cutting, 39% 1996, 57% avg. Watermelons 91% running, 97% 1996, 80% avg.; Livestock 1% poor, 12% fair, 77% good, 10% excellent. Fed cattle prices steady to $3.00 lower.

OREGON: Days suitable for fieldwork 5.8. Topsoil 2% very short, 9% short, 85% adequate, 4% surplus. Subsoil 2% very short, 7% short, 89% adequate, 2% surplus. Winter wheat 1% poor, 12% fair, 55% good, 32% excellent. Winter wheat 98% headed, 94% 1996, 95% avg. Activities: Rain hampered hay cutting, fieldwork. Some hay already down, rained on. In Lake County Some alfalfa hay cut because of weevils in southeast. Eastern area sugar beet, wheat crops reported looking good. In Mid-Columbia area growers getting spray tanks ready due to early fires. Fall seeded grain in milk stage. Nurseries shifting to summer maintenance programs. Many nurseries shipped balled stock. A fungus problem caused some problems southern coast's Easter lily crop. Eastern regions vegetable crops progressing nicely. Mid-Columbia: Green pea harvest continued on irrigated acres, asparagus harvest winding down. Potatoes excellent, no late blight reported. Klamath Basin: Potatoes reported 85% emerged. Willamette Valley: Vegetable crops planting, harvesting continued. Late blight on tomatoes found. Sweet corn, green beans emerged, looking good. Onions greening up, some areas ahead of schedule. Strawberry harvest at peak. Sweet cherry harvest beginning, southern valley producers seeing 10% splitting. Raspberry, blueberry harvest quickly approaching. Rogue River Valley: Bartlett pear thinning underway. Pear cover sprays being applied in the Hood, Rogue River valleys. Southern Coast: Blackheaded fireworm moths, cranberry gridlers active in cranberry bogs. Livestock generally good to excellent. Rainfall in western areas allowed for additional growth of pasture, range. Southwest sections reported irrigation of pastures stopped due to rain. Cattle being moved to higher elevated ranges.

PENNSYLVANIA: Good week for fieldwork. Days suitable for fieldwork 5.5. Soil moisture 1% very short, 23% short, 73% adequate, 3% surplus. Corn height 7 in., 9 in. 1996, 8 in. avg.; 5% poor, 30% fair, 60% good, 5% excellent. Tobacco transplanted 67% complete, 50% 1996, 67% avg. Soybeans planted 87% complete, 80% 1996, 83% avg.; % poor, 23% fair, 68% good, 6% excellent. Potatoes planted 96% complete, 96% 1996, 98% avg. Barley 70% turning yellow, 69% 1996, 56% avg. Wheat 95% heading or headed, 98% 1996, 96% avg. 15% turning yellow, 35% 1996, 16% avg.; 4% poor, 25% fair, 63% good, 8% excellent. Oats 20% heading or headed, 23% 1996, 15% avg.; 4% poor, 30% fair, 58% good, 8% excellent. Alfalfa 1st cutting 62% complete, 60% 1996, 62% avg. Timothy clover 1st cutting 33% complete, 27% 1996, 39% avg. Quality of hay made 2% very poor, 4% poor, 24% fair, 45% good, 25% excellent. Peach 20% very poor, 25% poor, 20% fair, 35% good. Apple 10% poor, 35% fair, 55% good. Activities: Plowing; planting corn, soybeans; making hay and haylage; spraying; fixing fences; hauling manure; caring for livestock.

SOUTH CAROLINA: Soil moisture 4% short, 79% adequate, 17% surplus. Barley 74% harvested, 51% 1996, 50% avg.; 5% fair, 52% good, 43% excellent. Cantaloupes 1% very poor, 24% poor, 33% fair, 42% good. Corn 46% silked, 43% 1996, 35% avg.; 14% doughed, 14% 1996, 15% avg.; 5% poor, 25% fair, 55% good, 15% excellent. Cucumbers 39% harvested, 28% 1996, 45% avg.; 90% fair, 10% good. Grain hay 99% harvested, 94% 1996, 91% avg.; 2% very poor, 4% poor, 35% fair, 53% good, 6% excellent. Oats 97% ripe, 97% 1996, 92% avg.; 67% harvested, 71% 1996, 61% avg.; 2% poor, 21% fair, 63% good, 14% excellent. Peaches 25% harvested, 9% 1996, 14% avg.; 34% fair, 40% good, 26% excellent. Rye 94% ripe, 94% 1996, 86% avg.; 66% harvested, 49% 1996, 47% avg.; 3% poor, 33% fair, 57% good, 7% excellent. Snap beans 96% planted, 100% 1996, 91% avg.; 1% poor, 15% fair, 84% good. Sorghum 63% planted, 68% 1996, 59% avg.; 7% fair, 54% good, 39% excellent. Soybeans 19% fair, 74% good, 7% excellent. Sweet potatoes 77% planted, 93% 1996, 76% avg.; 24% fair, 76% good. Tobacco 24% topped, 17% 1996, 14% avg.; 5% poor, 22% fair, 67% good, 6% excellent. Tomatoes 28% fair, 71% good, 1% excellent. Watermelons 5% poor, 42% fair, 50% good, 3% excellent. Winter wheat 70% ripe, 95% 1996, 94% avg.; 25% harvested, 63% 1996, 51% avg.; 2% poor, 13% fair, 55% good, 30% excellent.

SOUTH DAKOTA: Days suitable for fieldwork 4.5. Topsoil 3% very short, 10% short, 75% adequate, 12% surplus. Subsoil 2% short, 75% adequate, 23% surplus. Winter wheat 74% boot. Winter rye 95% boot. Spring wheat 17% boot. Winter rye 5% poor, 22% fair, 61% good, 12% excellent. Alfalfa hay 1% very poor, 6% poor, 29% fair, 46% good, 18% excellent. Sunflowers 67% planted. Flax 96% planted, 77% emerged. Livestock 1% poor, 10% fair, 68% good, 21% excellent. Feed supplies 4% very short, 8% short, 82% adequate, 6% surplus. Stock water supplies 72% adequate, 28% surplus.

TENNESSEE: Days suitable for fieldwork 1.0. Topsoil 24% adequate, 76% surplus. Subsoil 31% adequate, 69% surplus. Excess rainfall, cloudy days continued to cause a significant delay in fieldwork last week. Farmers' fieldwork activities were minimal with only a few tobacco fields being transplanted. Plenty of sunshine, warm temperatures are still needed. Corn 3% very poor, 11% poor, 33% fair, 43% good, 10% excellent; 0% tasseled, 2% 1996, 7% avg. Tobacco 11% poor, 40% fair, 44% good, 5% excellent; 61% transplanted, 83% 1996, 89% avg. Tobacco transplant supplies 16% very short, 42% short, 42% adequate. Wheat 44% ripe, 54% 1996, 67% avg.; 0% harvested, 12% 1996, 21% avg. Wheat insect or disease damage 5% none, 49% light, 40% moderate, 6% severe. Sorghum 3% poor, 37% fair, 54% good, 6% excellent; 86% planted, 91% 1996, 95% avg. Pasture feed 3% poor, 23% fair, 56% good, 18% excellent. Alfalfa hay 3% poor, 35% fair, 52% good, 10% excellent; 86% 1st cutting, 97% 1996, 98% avg. Other hay 3% very poor, 9% poor, 35% fair, 45% good, 8% excellent.

TEXAS: Heavy rains and cooler weather moved across the plains and northern areas during the week. High winds, heavy downpours, and hail caused damage in numerous fields. Despite weather problems, crops made remarkably good progress. Warmer weather is needed. Across central and southern areas, crops also made good progress with scattered rainfall reported. Ranges and pastures continued to make good progress. However, haying activity slowed in many areas due to wet conditions. Livestock markets continued to show good prices. Producers in most areas reported very good gains on pastured cattle and sheep. Crops: Rain in the High Plains helped with grain development. However, excessive amounts along with high winds and hail damaged some fields. Warmer, open conditions are needed for good progress to continue. Wet conditions stalled harvest operations in the northern and central areas. Harvest resumed late in the week in central and south-central areas. Progress was 26% harvested, compared with 49% in 1996 and the 36% avg. Corn fields in the plains have responded favorably to rain. Irrigation needs were curtailed in many fields. Some hail damage was reported. Fields in the central and south-central areas continued to make good to excellent progress with most of the crop in the milk or dough stage. Fields were beginning to dent in the Coastal Bend and Rio Grande Valley, where good progress was also reported. Progress was 29% silked, compared with 48% in 1996 and the 47% avg., and 9% dough, compared with 24% in 1996and the 22% avg. Cotton fields sustained light, heavy damage due to hail and heavy rains in the plains early in the week. Producers were replanting to alternative crops as necessary. Fields were squaring in the central areas, with increased insect problems reported. Spraying activity occurred as conditions allowed. Plants were setting bolls in the Coastal Bend and Rio Grande Valley. Fields along the Upper Coast made good progress and remained behind normal. Progress was 4% setting bolls, compared with 10% in 1996 and the 9% avg. Grain Sorghum: Wet conditions stalled planting in the Plains, where some replanting may be necessary due to isolated hail and heavy rains. Early- planted fields made good progress. Fields were turning color in the Coastal Bend and south-central areas. Some disease problems occurred. Fields in the Blacklands

were heading and showed good progress. Statewide condition was 88% normal compared with 58% in 1996; 26% was headed, compared with 39% in 1996 and the 44 % avg.; 5% was headed, compared witj 19% in 1996 and the 19% avg.; 0% was harvested, compared with 5% in 1996 and the 4% avg. Peanut fields were pegging and showing good progress in north-central areas, where final planting operations were stalled by wet conditions. Fields in the south-central areas look good, and planting continued. Rice: Most fields along the Upper Coast made good progress. Some fungicide applications occurred. Soybeans: Early fields in the plains were up to good stands. Planting was slowed by wet conditions early in the week. Fields along the Upper Coast made good progress. Sugarbeets: Cooler weather slowed progress in the High Plains. Other Crops: Sunflowers were 51% planted, compared with 56% in 1996 and the 65% avg.

Commercial Vegetables: In the Rio Grande Valley, harvest continued without much delay for most vegetables. In San Antonio-Winter Garden, cabbage, carrot, and onion harvest was slowed at times by rain. Watermelon and cantaloup harvests were slowly increasing. In the High Plains, progress was good on potatoes and onions. In the east, harvest activity continued as weather conditions allowed. Sweetpotatoes continued to be set out. Trans-Pecos, cantaloups sizing well. Peach harvest early varieties continued many areas. Brown rot continued to cause problems many orchards. Pecan producers scouting for second generation case bearers after very light number from first generation in most areas. Webworms continued a problem where no treatment occurred.

Range and Livestock: Livestock, pasture conditions remained very good. Gains for cattle good. Producers continued mark lambs many areas. Market prices continued good especially on calves. Haying activity slowed by wet conditions.

UTAH: Days suitable for fieldwork 3.8. Topsoil 1% very short, 7% short, 70% adequate, 22% surplus. Subsoil 1% very short, 10% short, 69% adequate, 20% surplus. Pasture feed, range 2% very poor, 6% fair, 68% good, 24% excellent. Winter wheat heading or better 87%, 89% 1996, 83% avg. Spring wheat heading or better 55%. Barley heading or better 44%. Corn: emerged 97%, 97% 1996, 92% avg.; height 9 in., 7 in. 1996, 9 in. avg. Alfalfa hay 1st cutting 45%, 56% 1996, 64% avg. Other hay cutting 9%, 11% 1996, 19% avg. Dry beans planted 95%. Cattle moved to summer range 82%, 91% 1996, 86% avg. Sheep moved to summer range 86%, 91% 1996, 78% avg. Major farm, ranch activities: Hay harvesting, irrigating, spraying for weeds, spraying fruit trees, moving cattle and sheep to summer range, moving hay. Alfalfa hay that is laying in the fields has started to rot due to wet weather. Alfalfa weevil is still a problem in some counties in stands that are uncut. Box Elder county reports some lodging in grain fields.

VIRGINIA: Days suitable for fieldwork 5.7. Topsoil 40% short, 55% adequate, 5% surplus. Subsoil 36% short, 60% adequate, 4% surplus. Corn 97% planted, 98% 1996, 99% avg.; 6% poor, 40% fair, 53% good, 1% excellent. Soybeans 50% planted, 49% 1996, 49% avg. Cotton 2% very poor, 18% poor, 50% fair, 30% good. Winter wheat 6% poor, 28% fair, 60% good, 6% excellent. Barley 35% harvested, 36% 1996, 34% avg.; 2% poor, 30% fair, 60% good, 8% excellent. Apples 5% very poor, 15% poor, 35% fair, 35% good, 10% excellent. Peaches 30% very poor, 30% poor, 20% fair, 20% good. Flue tobacco transplanted 99%, 99% 1996, 100% avg.; 5% poor, 37% fair, 55% good, 3% excellent. Burley tobacco transplanted 80%, 89% 1996, 75% avg.; 5% poor, 50% fair, 45% good. Dark fire cured tobacco transplanted 97%, 94% 1996, 98% avg.; 5% poor, 40% fair, 52% good, 3% excellent. Peanuts 5% poor, 45% fair, 45% good, 5% excellent. Summer potatoes 30% fair, 70% good. Pasture feed 9% poor, 40% fair, 45% good, 6% excellent. Alfalfa 8% poor, 36% fair, 47% good, 9% excellent. Other Hay 10% poor, 40% fair, 45% good, 5% excellent. Barley combining in full swing. Producers reporting good yields as well as weights for most of the barley crop; however, winter wheat is behind schedule with less than one percent harvested. Corn is now recovering from previously cool, dry conditions as warmer weather helped to improve poor stands and yellowing. Some localities still recovering from the earlier rains which continue to hamper cutting progress of an already aged hay crop. Dry conditions continue to be the cause of soybean planting delays as well as vegetable irrigation in some localities. Other activities included tobacco cultivation, continuation of insecticide, herbicide spraying of peanuts, cotton.

WASHINGTON: Days suitable for fieldwork 6.1. Topsoil 5% short, 90% adequate, 5% surplus. Subsoil 11% short, 87% adequate, 2% surplus. Winter wheat 80% headed, 76% 1996, 88% avg.; dryland 10% fair, 60% good, 30% excellent; irrigated 70% good, 30% excellent. Spring wheat 100% emerged, 100% 1996, 100% avg.; 47% headed, 35% 1996, 58% avg.; dryland 8% fair, 65% good, 27% excellent; irrigated 90% good, 10% excellent; developed rapidly under favorable conditions. Barley 100% emerged, 99% 1996, 100% avg.; dryland, 10% fair, 70% good, 20% excellent; irrigated 100% good. Corn 100% good. Spring, winter grains continued to look good to excellent, with late planted spring crops improving considerably. Dry beans 77% planted, 94% 1996, 91% avg. Potatoes, 1% fair, 99% good. Hay, other roughage supplies, 2% very short, 19% short, 77% adequate, 2% surplus. Weather has delayed the first hay harvest. Most alfalfa that was cut has been rained on, many producers are waiting for a stable period of weather before cutting of alfalfa or timothy hay. Northeastern Washington reported that flooding in the Cusick flats will ruin many timothy hay fields. Range, pasture feed 5% poor, 21% fair, 62% good, 12% excellent. West of the Cascades, strawberry harvest was in full swing with raspberries and tree fruit developing nicely. Rain showers, in central areas, were reported to have not caused any significant damage to the sweet cherry crop, harvest was underway. Producers continue to combat the weather effects on disease, insect infestations in orchards. Commercial vegetable producers finished planting sweet corn in the west. Harvest of asparagus was nearly complete with harvesting of green peas underway.

WEST VIRGINIA: Days suitable for fieldwork 3.9. Topsoil 6% short, 84% adequate, 10% surplus. Corn 1% very poor, 2% poor, 27% fair, 66% good, 4% excellent; 96% planted, 87% 1996, 91% avg. Hay 9% poor, 36% fair, 49% good, 6% excellent; 1st cutting 23%, 23% 1996, 46% avg.; harvest active. Oats 25% fair, 75% good; 95% emerged, 89% 1996, 98% avg.; 58% headed. Soybean 87% planted, 67% 1996, 68% avg. Tobacco transplanted 69%, 73% 1996, 86% avg. Wheat 1% poor, 54% fair, 45% good; 92% headed, 90% 1996, 91% avg. Apple 60% fair, 32% good, 8% excellent. Peach 16% poor, 84% fair. Cattle 25% fair, 67% good, 3% excellent. Sheep 8% fair, 90% good, 2% excellent. Activities: Farmers made good progress planting corn, soybeans, transplanting tobacco. Thinning apples, peaches; general maintenance.

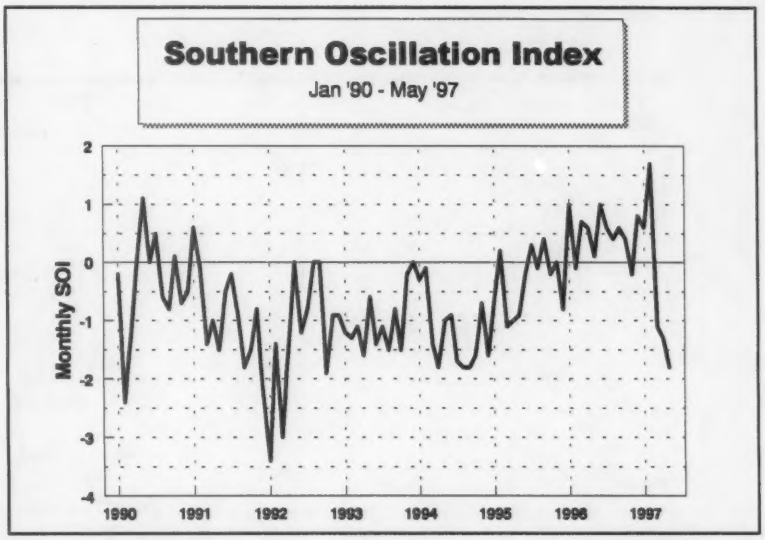
WISCONSIN: Days suitable for fieldwork 6.0. Soil moisture 11% very short, 34% short, 53% adequate, 2% surplus. First crop hay harvest 48% started, 22% 1996, 43% avg. Chippewa County reports first crop haymaking in full swing. In Oconto County, commercial sweet corn is just about planted. Soybean planting almost complete at 99%, 78% 1996, 87% avg. A Grant County reporter states that oats look good with a nice, green color. Pasture feed 2% very poor, 15% poor, 41% fair, 38% good, 4% excellent. Tobacco planting began in Dane County. Winter wheat 1% very poor, 3% poor, 18% fair, 65% good, 13% excellent.

WYOMING: Days suitable for fieldwork 3.8. Topsoil 9% short, 66% adequate, 25% surplus. Stock water 2% short, 90% adequate, 8% surplus. Winter wheat 95% boot, 95% 1996, 87% avg.; 91% headed, 53% 1996, 60% avg.; 1% poor, 23% fair, 60% good, 16% excellent. Barley 86% jointed, 85% 1996, 79% avg.; 63% boot, 52% 1996, 53% avg.; 24% headed, 13% 1996, 21% avg.; 1% poor, 9% fair, 86% good, 4% excellent. Oats 57% jointed, 70% 1996, 59% avg.; 26% boot, 35% 1996, 28% avg.; 9% headed, 6% 1996, 6% avg.; 1% poor, 17% fair, 79% good, 3% excellent. Spring wheat 60% jointed, 58% 1996, 61% avg.; 24% boot, 35% 1996, 41% avg.; 15% headed, 4% 1996, 11% avg.; 42% fair, 55% good, 3% excellent. Sugar beets 39% thinned, 57% 1996, 57% avg.; 1% poor, 4% fair, 92% good, 3% excellent. Corn 98% emerged, 95% 1996, 92% avg.; 9% fair, 42% good, 49% excellent. Dry beans 94% planted, 98% 1996, 90% avg.; 74% emerged, 69% 1996, 59% avg.; 3% fair, 91% good, 6% excellent. Alfalfa 3% first cutting complete, 11% 1996, 12% avg. Range, pasture feed 1% poor, 12% fair, 59% good, 28% excellent. Range flock ewes lambed 96%, 92% 1996, 97% avg. Livestock in mostly good condition.

ENSO Update: Further Strengthening

The following is based on the El Niño/Southern Oscillation (ENSO) advisory issued on June 10, 1997, by the Climate Prediction Center, National Centers for Environmental Prediction.

Atmospheric and oceanic conditions in the tropical Pacific indicated a further strengthening of warm episode conditions during May. Positive sea surface temperature (SST) anomalies have increased dramatically in the central and eastern equatorial Pacific during the past few months, particularly near the South American coast. In May, SST's greater than 29°C were observed from Indonesia to 160°W. Equatorial SST anomalies exceeded +1.0°C from 175°E eastward to the South American coast, with values greater than +4.0°C observed in the extreme eastern Pacific. Consistent with this warmth, the average anomaly in the Niño 1+2 region (0-10°S, 80-90°W) was +2.9°C during May, which is the largest value observed since August 1983.



All atmospheric indices typically used to monitor the Southern Oscillation are consistent with strengthening warm episode conditions. During May, enhanced tropical convection was observed near the date line, with suppressed convection over the western equatorial Pacific and Indonesia. Consistent with this pattern, large low-level westerly wind anomalies were observed from Indonesia to just west of the date line.

The sea level pressure (SLP) pattern during May featured negative anomalies throughout the central and eastern tropical Pacific and positive anomalies over the western Pacific. Consistent with this pattern, the Southern Oscillation Index (SOI) was -1.8, with negative sea level pressure (SLP) anomalies observed at Tahiti (-1.8) and postive anomalies observed at Darwin (1.0). This is the third consecutive month with a large negative value of the SOI (see figure below).

In keeping with recent trends, the latest NCEP statistical (CCA) and coupled model predictions indicate that SST anomalies in the tropical Pacific should continue to increase, with warm episode conditions intensifying during the remainder of the year. Given the magnitude of the SST and OLR anomalies, it is likely that atmospheric circulation anomalies typical of those generally experienced during warm episodes should develop during the next several months. In particular, it is expected to remain drier than normal over Indonesia and India, and wetter than normal over the central tropical Pacific. Also, a stronger-than-normal South Pacific jet stream should develop and extend farther east than normal. Thus, central Chile and central Argentina, Uruguay, and southern Brazil are likely to experience a wetter-than-normal winter.

International Weather and Crop Summary

June 8 - 14, 1997

HIGHLIGHTS

FSU-WESTERN: Widespread showers and thunderstorms were accompanied by unusually warm weather, promoting rapid growth of winter grains and summer crops.

FSU-NEW LANDS: Widespread rain and mild weather favored spring grain germination and establishment in Russia, while periodic hot weather in Kazakstan lowered topsoil moisture.

EUROPE: Mild weather was accompanied by widespread precipitation over northern and eastern Europe, providing nearly ideal growing conditions for crops.

AUSTRALIA: Scattered showers kept topsoils moist for early development in primary winter grain areas.

CANADA: Rain increased Prairie moisture levels as warmer, drier weather helped Ontario crop development.

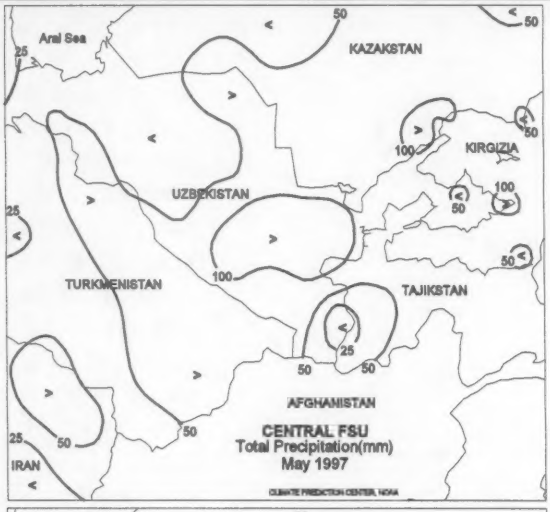
SOUTH ASIA: Beneficial showers in southern India improved prospects for grain, oilseed, and cotton planting.

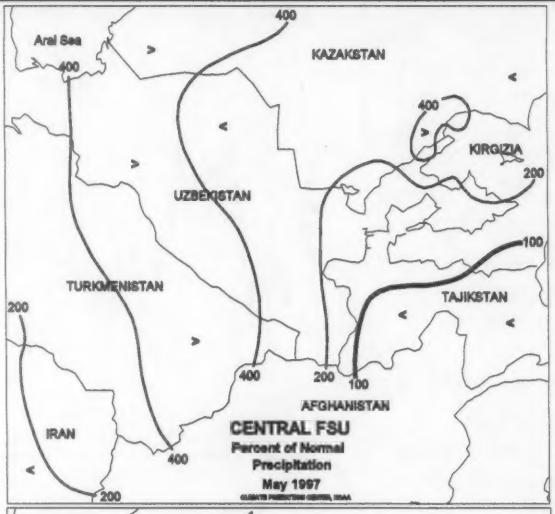
SOUTHEAST ASIA: Dry, warm weather in Thailand and below-normal rainfall in the Philippines reduced moisture for rainfed corn and rice.

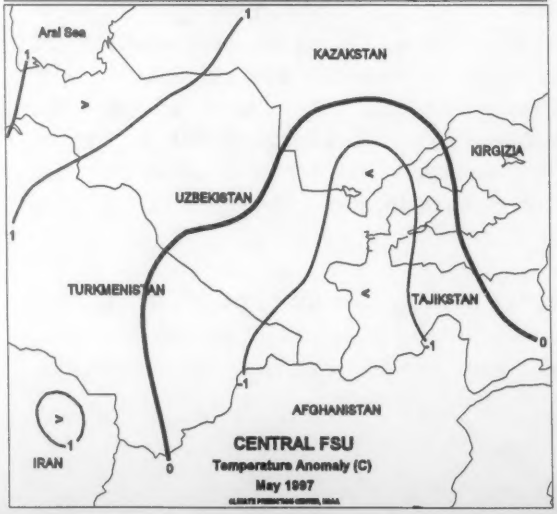
EASTERN ASIA: Drier, warmer weather favored winter wheat harvesting but reduced soil moisture for developing summer crops across the North China Plain.

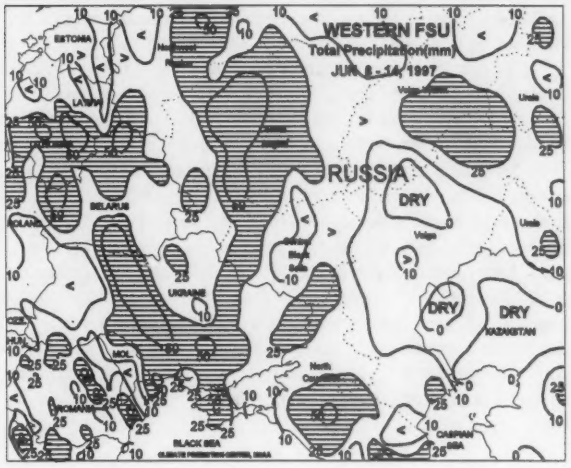
SOUTH AMERICA: Widespread rain boosted topsoil moisture for winter wheat planting across central Argentina and southern Brazil.

MEXICO: Below-normal rainfall continued to reduce moisture for vegetative corn.



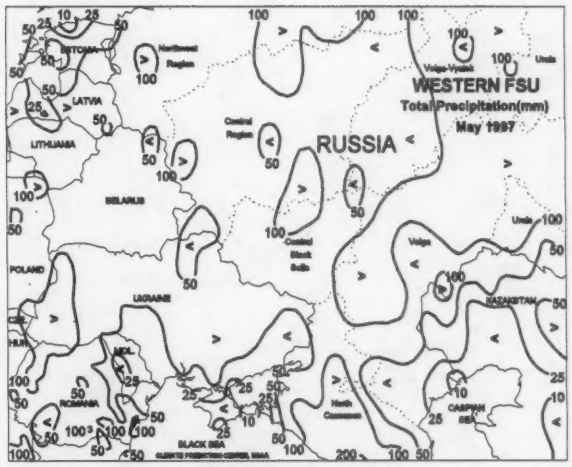


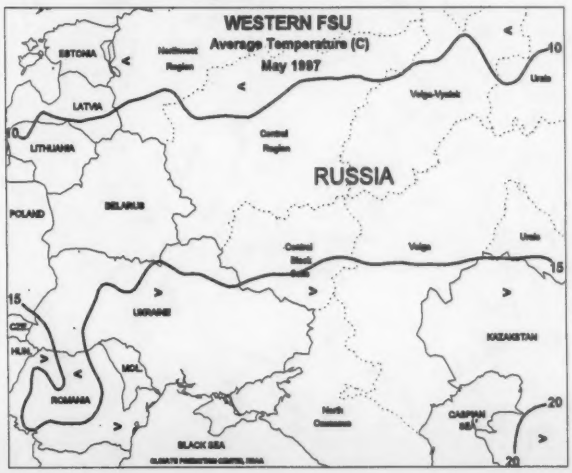


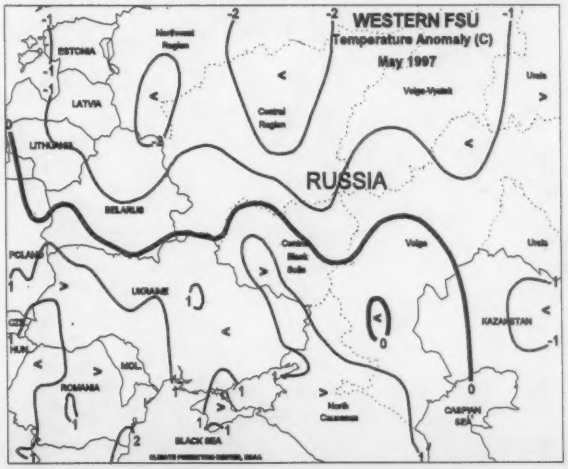


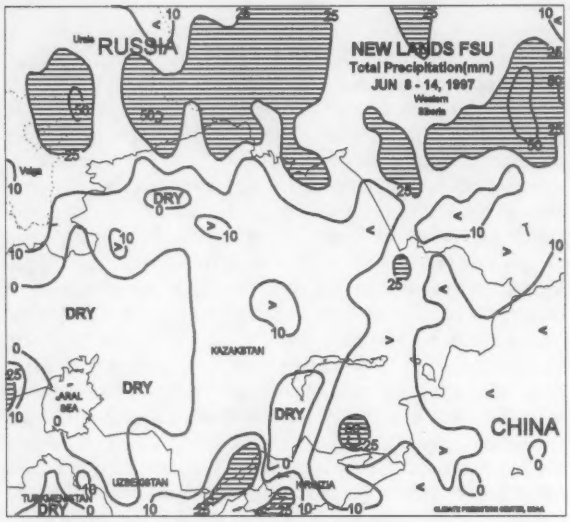
FSU-WESTERN

Widespread showers and thunderstorms maintained favorable moisture conditions for crop development. The exception was the middle Volga Valley in Russia, where unusually warm, dry weather prevailed. In Ukraine, wet weather (10-50 mm, with local amounts in excess of 50 mm) benefited winter grains in the filling stage and summer crops in the vegetative stage. Farther north, soaking rains (13-61 mm) in northern Russia (Northwest Region, Central Region, the northern half of the Central Black Soils Region, and the Volga Vyatsk), Belarus, and the Baltics were timely for winter grains in or nearing the heading stage. In southern Russia (southern half of the central Black Soils Region, lower Volga Valley, and the North Caucasus), light to moderate showers (10-40 mm, with scattered amounts in excess of 40 mm) and unusually warm weather promoted rapid development of winter grains and summer crops. In May, above-normal precipitation fell in Russia, northern Ukraine, Belarus, and the Baltics, providing favorable moisture for winter grain and spring-planted crop development. Two to four times the normal amount of rain fell in the Volga Valley, a key spring grain-producing region. Although the rain boosted soil moisture, it likely caused some delays in spring grain planting. In southern Ukraine, a period of hot, dry weather during the first 3 weeks in May reduced topsoil moisture for emerging spring grains and summer crops. However, showers and cooler weather at month's end improved growing conditions.



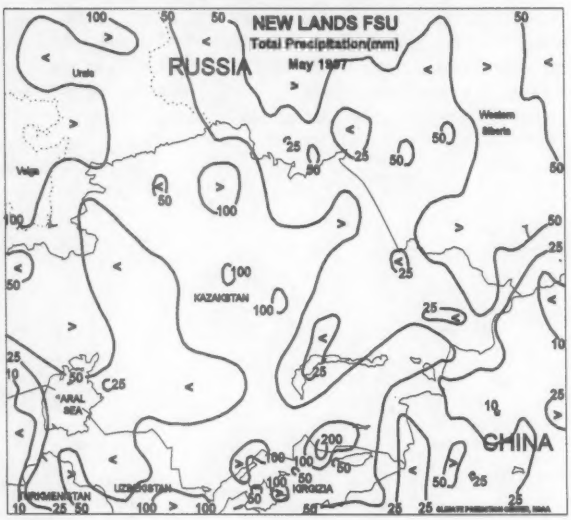


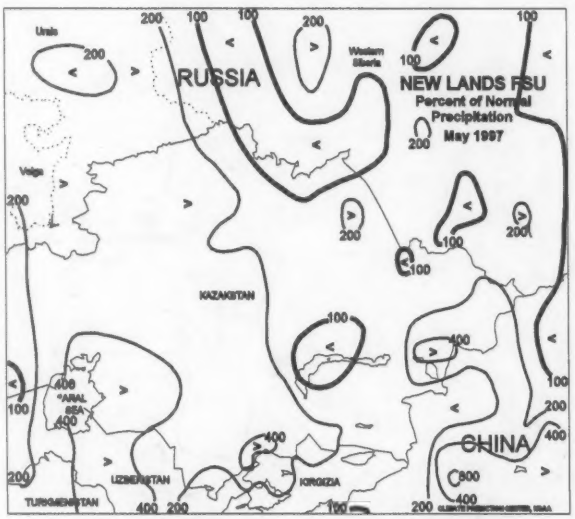


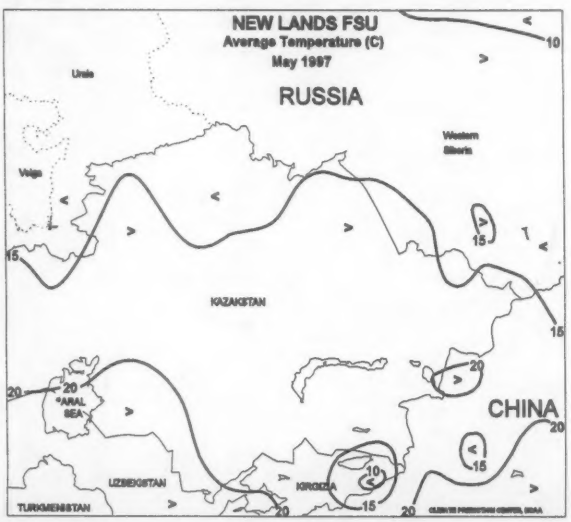


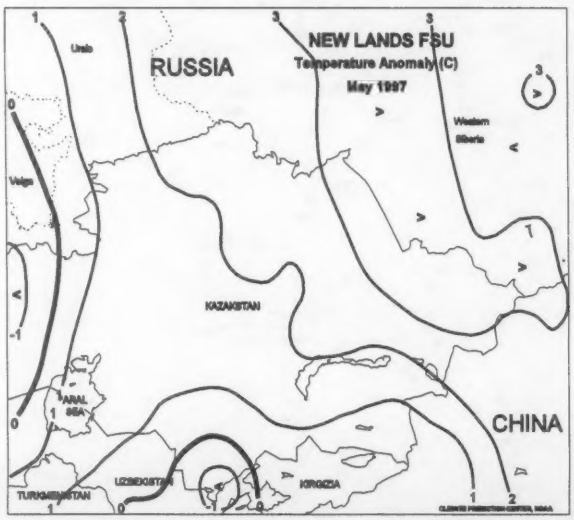
FSU-NEW LANDS

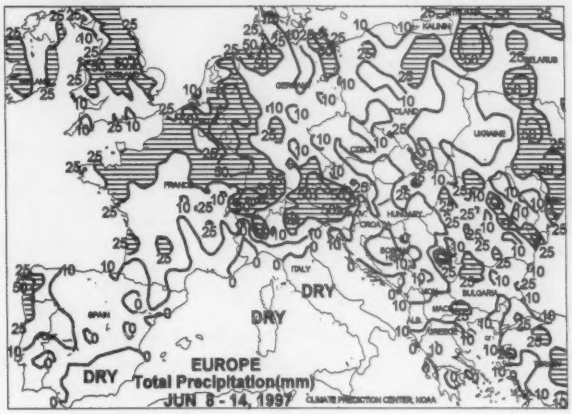
In Russia, widespread rain (10-50 mm) and mild weather prevailed over spring grain areas in the Urals, Western Siberia, and Eastern Siberia, promoting rapid germination and favoring early crop establishment. Farther south, however, lesser amounts of rain (3-17 mm) fell in spring grain areas in Kazakstan and were accompanied by periodic heat. Extreme maximum temperatures in Kazakstan ranged from 34 to 36 degrees C, increasing evaporation rates and lowering topsoil moisture needed for crop establishment. Additional rain and cooler weather are needed in Kazakstan to ensure a favorable start to this year's growing season. In May, most spring grains (spring wheat, spring barley, and oats) are typically planted in Russia and Kazakstan. In Russia, weather conditions in Western Siberia favored spring grain planting, while cool, wet weather in the Urals caused some planting delays. In Kazakstan, abundant pre-planting moisture in early May was followed by a drying trend that began around May 18 and continued until month's end, allowing planting to occur on schedule.





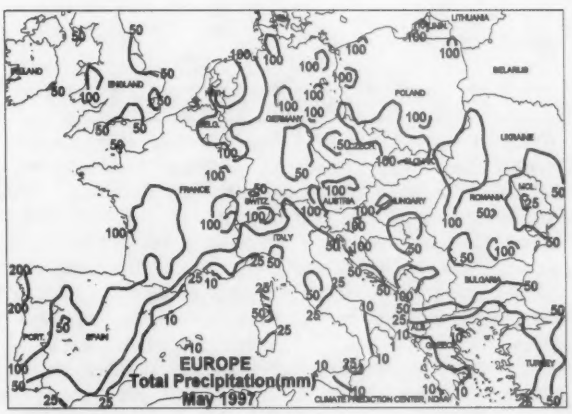


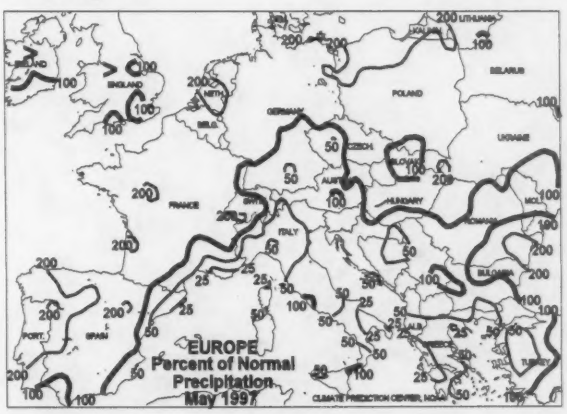


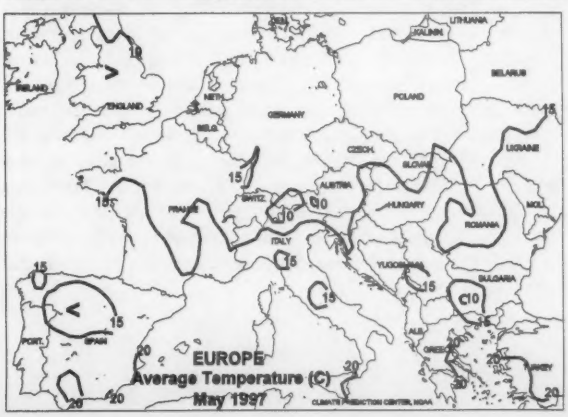


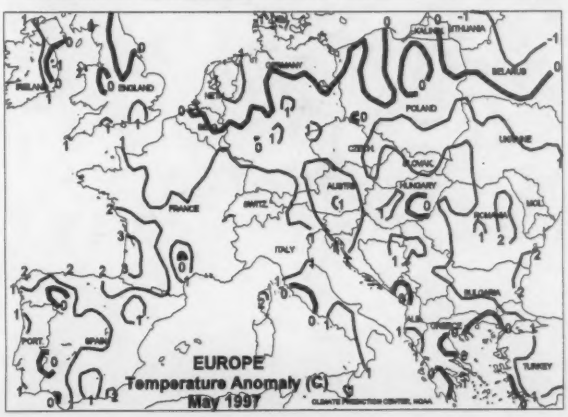
EUROPE

Light to moderate rain (10-40 mm, with local amounts in excess of 50 mm) continued in the United Kingdom, France, the Benelux countries, and Germany, benefiting winter grains in the filling stage and summer crops in the vegetative stage. Farther south, dry weather prevailed over Spain and peninsular Italy, aiding winter wheat harvesting. In eastern Europe, mild weather and light showers (7-25 mm, with scattered amounts in excess of 25 mm) maintained favorable growing conditions for crop development. Weekly temperatures averaged 1 to 4 degrees C above normal throughout most of Europe. In May, above-normal precipitation prevailed over the United Kingdom, France, the Benelux countries, and the northern half of Germany, reversing April's well-below-normal precipitation pattern in these areas. The rain was timely for winter grains that advanced through reproduction and improved soil moisture for summer crop emergence and early establishment. Wet weather extended southward into Portugal and Spain, benefiting spring grains and summer crops but slowing winter grain maturation and harvesting. In Italy, below-normal precipitation in May limited moisture for winter grains in the filling stage and for summer crop establishment. In southeastern Europe, dry weather during the first 3 weeks of the month aided corn and sunflower planting, delayed by persistent wetness in April. However, there was a period of unfavorably hot weather (extreme maximum temperatures ranging from 30-35 C) in southern Romania, Bulgaria, and adjacent areas in former Yugoslavia from May 17-22 that reportedly caused some damage to newly emerging crops. On about May 22, cooler weather and showers began over the region and continued until month's end, improving conditions for plant growth and development.

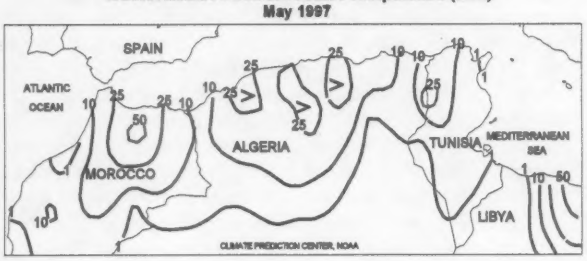




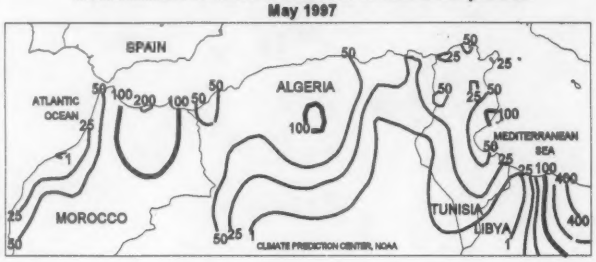




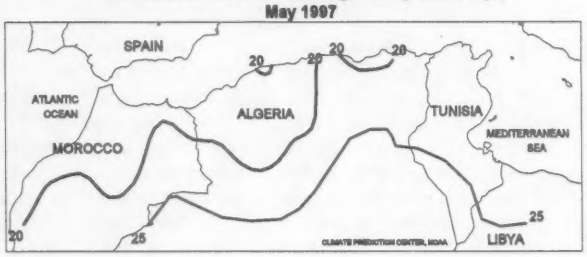
NORTHWEST AFRICA Total Precipitation (mm)
May 1997



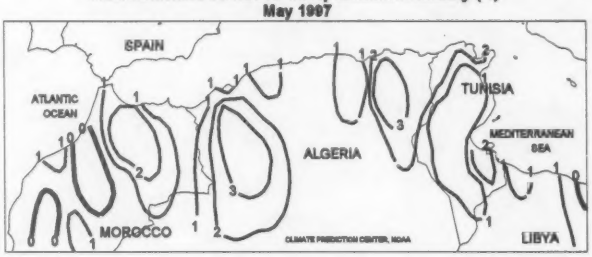
NORTHWEST AFRICA Percent of Normal Precipitation
May 1997

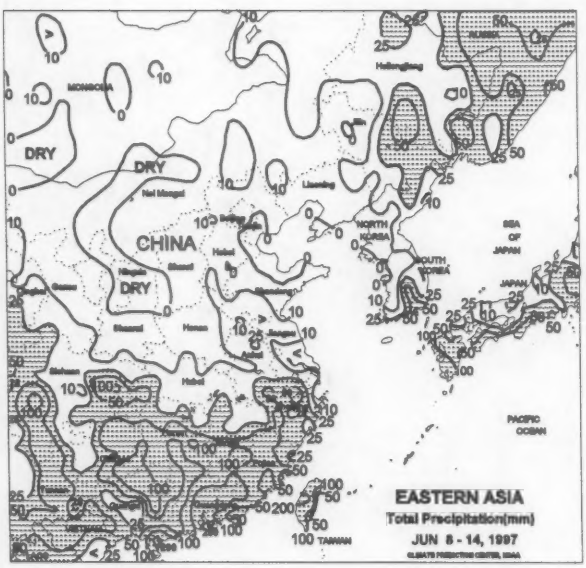


NORTHWEST AFRICA Average Temperature (C)
May 1997



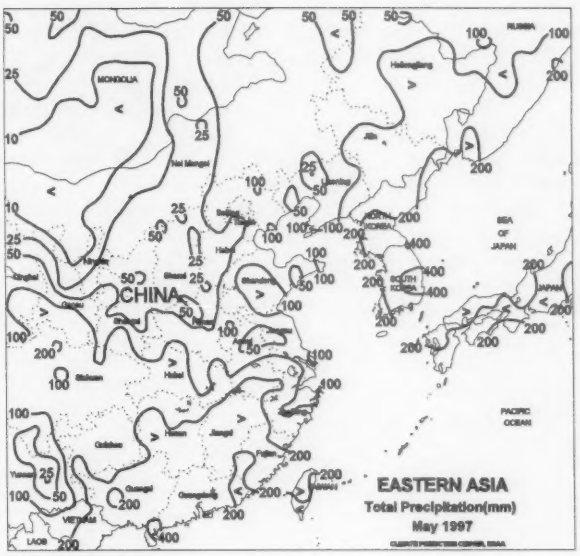
NORTHWEST AFRICA Temperature Anomaly (C)
May 1997

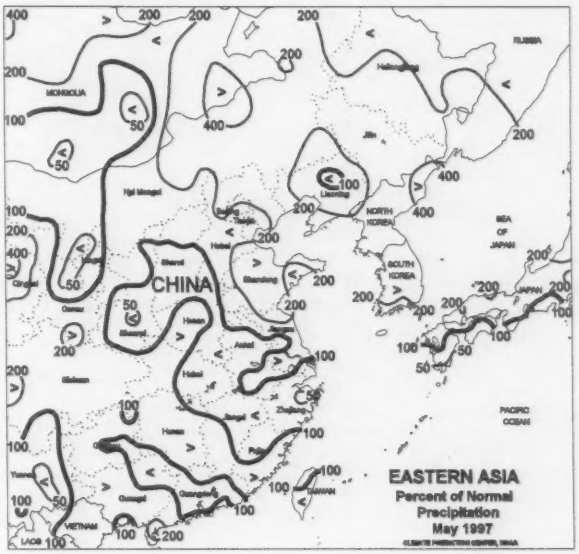


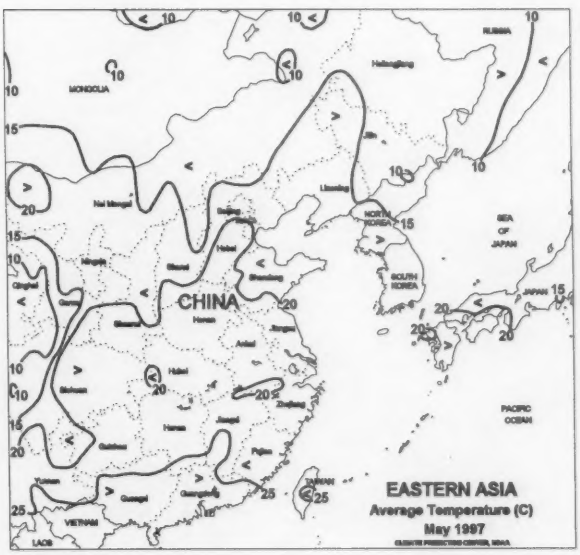


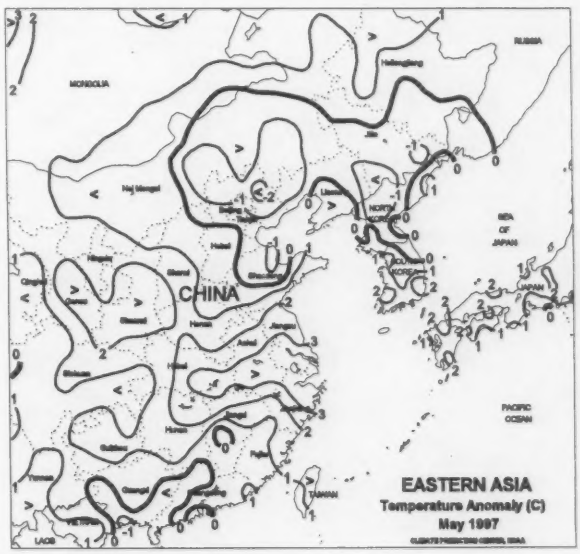
EASTERN ASIA

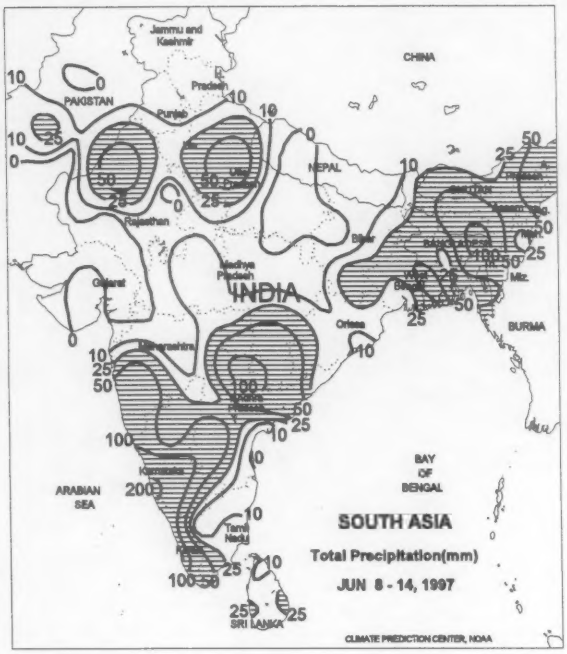
Warmer, drier weather favored winter wheat harvesting across the North China Plain, but reduced soil moisture for summer crops. Rainfall (5-20 mm) was confined to southern Shandong, Henan, Anhui, and Jiangsu. Maximum temperatures peaked from 35 to 37 degrees C by mid-week, but cooler weather prevailed later in the week. The warm weather also reached into Manchuria, where maximum temperatures ranged from 36 to 39 degrees C. Light rain (less than 10 mm) fell across southern Manchuria (Liaoning, western Jilin, and neighboring areas of Nei Mongol), but heavier amounts (10-30 mm) were reported in Heilongjiang and central and eastern Jilin. Widespread showers (25-80 mm, with scattered amounts greater than 100 mm) again covered the Yangtze Valley and southern China, maintaining favorable moisture supplies, but causing isolated flooding. Temperatures averaged 1 to 3 degrees C below normal across southern China and 1 to 3 degrees C above normal across the North China Plain and Manchuria. Drier weather (less than 25 mm of rain) prevailed across the Korean Peninsula, while widespread rain (20-50 mm) continued across Japan. During May, rainfall averaged greater than 200 percent of normal across Shandong and Manchuria. Rainfall averaged near normal (80-120 percent of normal) elsewhere, except for Zhejiang where 40 to 60 percent of normal rainfall was reported. The Korean Peninsula and Japan also received greater than 200 percent of normal rainfall.


CHINA
EASTERN ASIA
Total Precipitation(mm)
May 1997


CHINA
EASTERN ASIA
Percent of Normal
Precipitation
May 1997

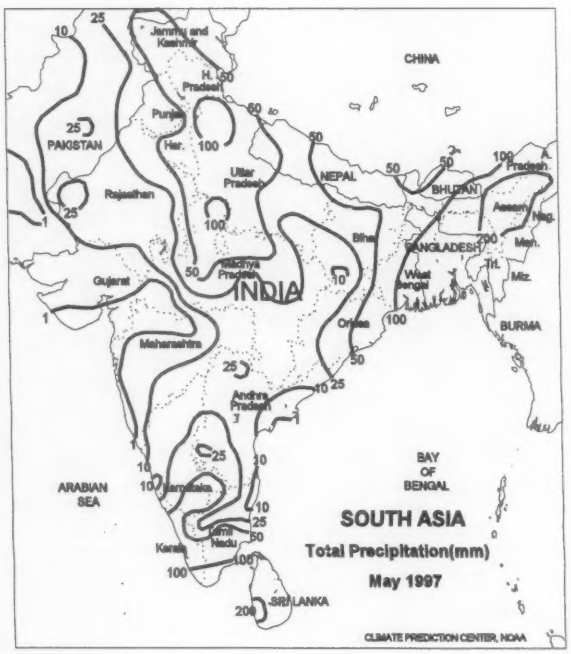

CHINA
EASTERN ASIA
Average Temperature (C)
May 1997

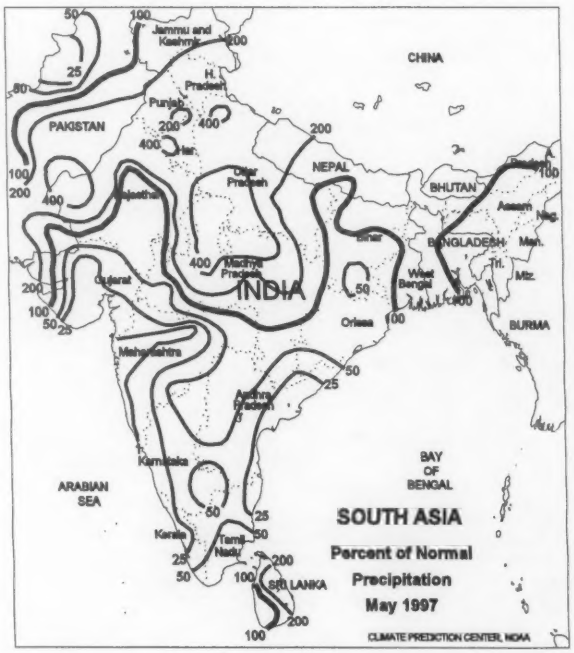

CHINA
EASTERN ASIA
Temperature Anomaly (C)
May 1997

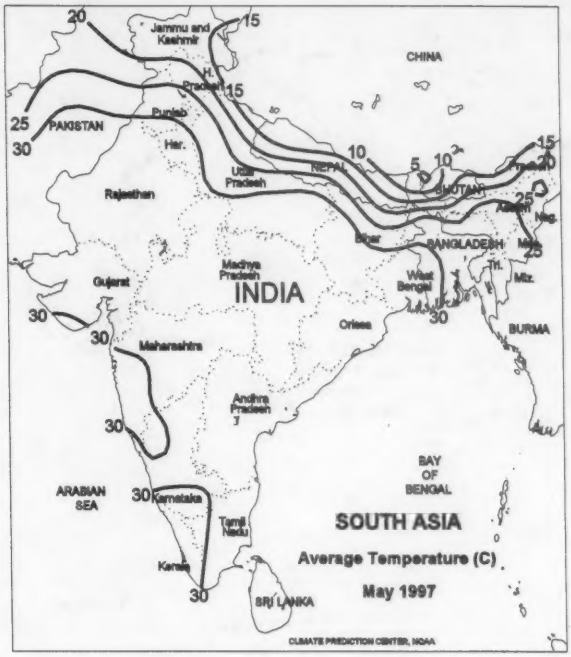


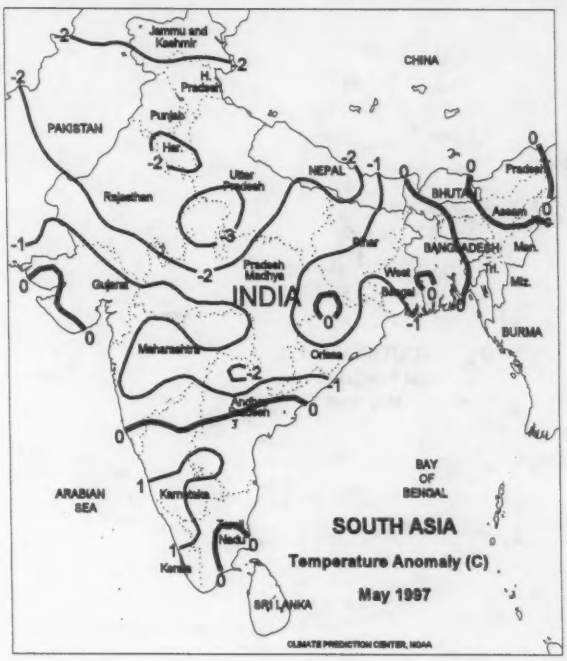
SOUTH ASIA

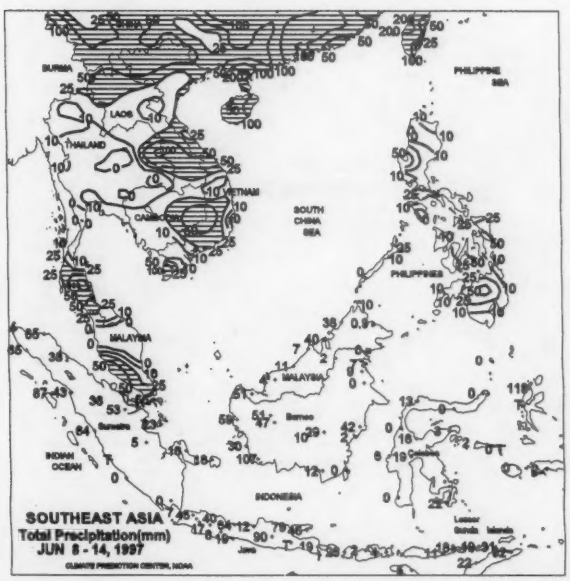
Beneficial showers (15-50 mm, exceeding 100 mm locally) throughout India's southern interior improved grain, oilseed, and cotton planting prospects. Heavier rain (100-200 mm or more) was concentrated along sections of the southwest coast, flooding some rice. The rainfall across the south was associated with the southwest monsoon, which showed signs of northward progress despite the current erratic nature of the overall circulation pattern. Elsewhere, variable rain (10-77 mm) continued in eastern India and Bangladesh as well as a few locations in northern and central India. Temperatures continued to average near to below normal, although highs reached the low 40's C everywhere but in the south and east. In May, an unseasonable weather pattern brought cooler- and wetter-than-normal weather to Pakistan and central and northern India. The anomalous May pattern also raised doubts about a normal monsoon. On May 19, a deadly cyclone struck southeastern Bangladesh, likely having minor impacts on rice and other agricultural crops.





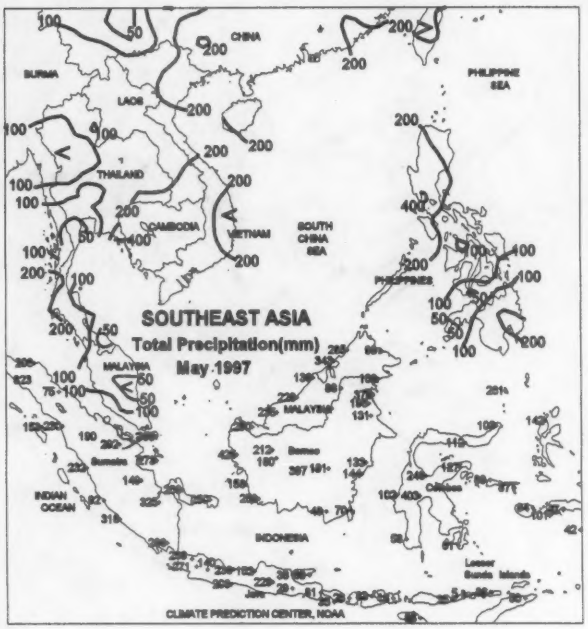


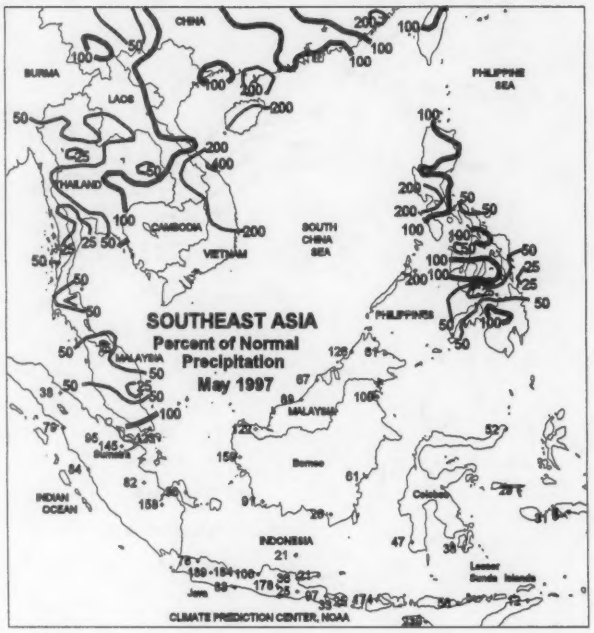


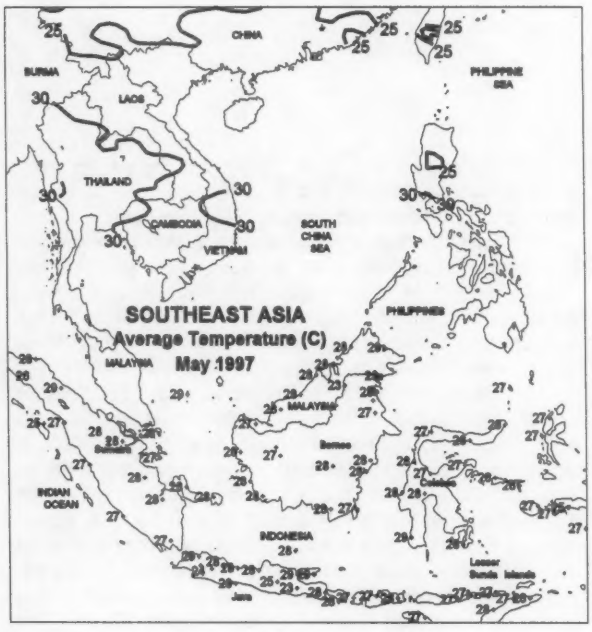


SOUTHEAST ASIA

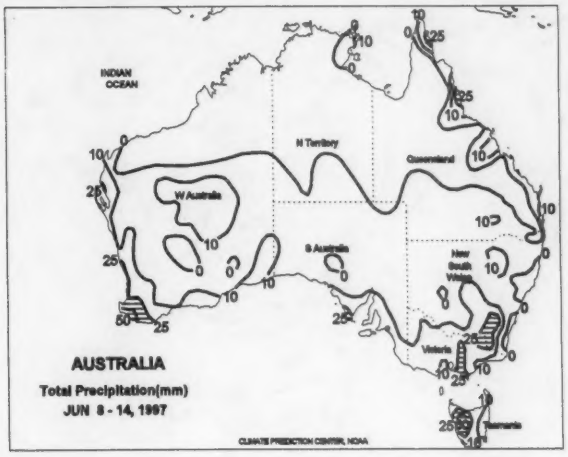
Mostly dry, warm weather (temperatures 2-3 degrees C above normal) prevailed across Thailand, reducing moisture for rainfed corn and rice. Only portions of extreme eastern Thailand received any significant rain (50-100 mm). Moisture is especially needed across western and central Thailand, where the majority of the rainfed crops are located. Showers (20-100 mm) helped to maintain moisture supplies for rice across northern and southern Vietnam. Below-normal rainfall (10-40 mm) continued across most of the Philippines, reducing moisture for rainfed crops. Across peninsular Malaysia, dryness returned to the east, while showers (20-60 mm) benefited oil palm in the west. Scattered heavy showers (20-90 mm) increased moisture supplies for second-crop rice in Java. During May, northern and southwestern Thailand received less than 50 percent of normal rainfall, central Thailand received slightly below-normal rainfall, and southeastern Thailand reported above-normal rainfall. In Vietnam, most areas received above-normal May rainfall, with central areas reporting greater than 200 percent of normal. In the Philippines, Luzon Island received above-normal May rainfall, while the central islands and Mindanao received mostly below-normal rainfall, with isolated pockets of near-normal rainfall. Most of peninsular Malaysia reported May rainfall as less than 50 percent of normal. In Java, monthly rainfall was above normal.


SOUTHEAST ASIA
Total Precipitation(mm)
May 1997
CLIMATE PREDICTION CENTER, NOAA


SOUTHEAST ASIA
Percent of Normal Precipitation
May 1997
CLIMATE PREDICTION CENTER, NOAA

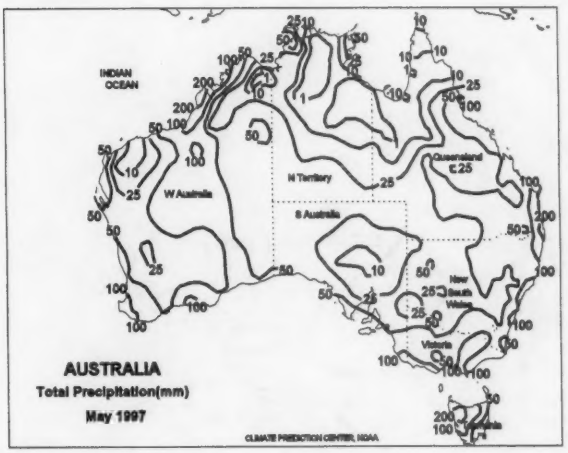

SOUTHEAST ASIA
Average Temperature (C)
May 1997

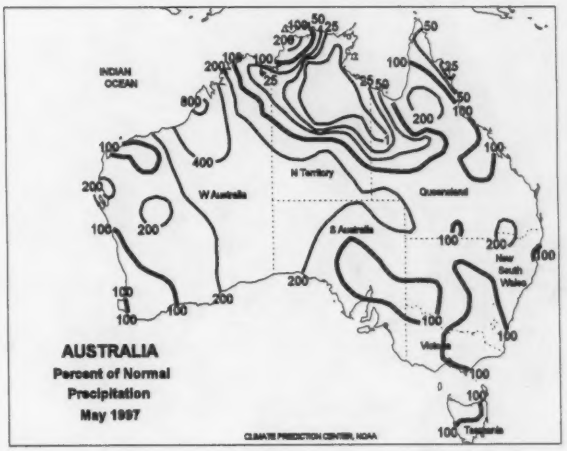
SOUTHEAST ASIA
Temperature Anomaly (C)
May 1997
CLIMATE PREDICTION CENTER, NOAA

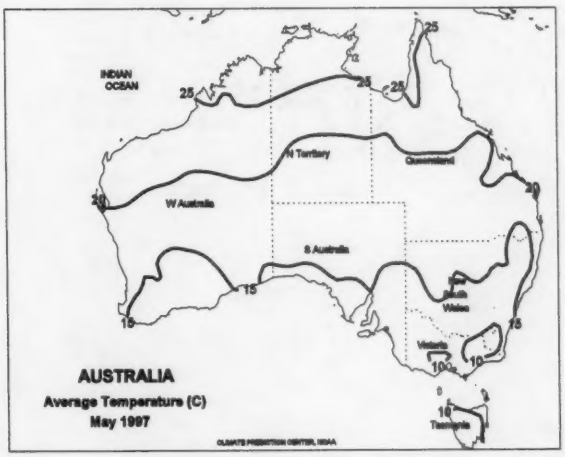


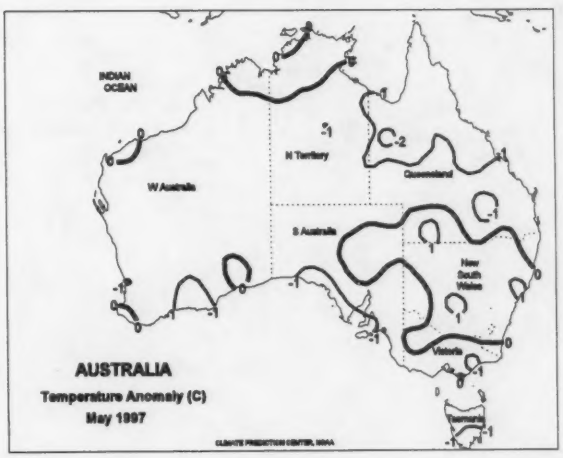
AUSTRALIA

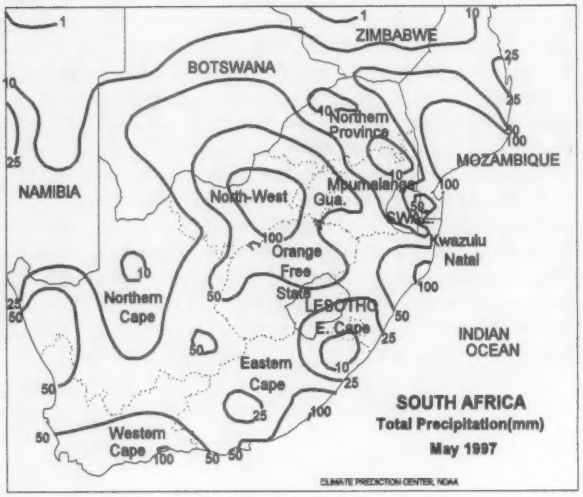
Scattered, mostly light showers (3-15 mm or more) covered the nation's primary winter grain regions, sustaining topsoil moisture for germination and early development. Locally heavy showers (25 mm or more) dotted locations along the west and southeast coasts. Temperatures varied during the week, with some patchy frost possible in the east, although the overall mildness aided newly planted wheat and barley. In New Zealand, light showers (25 mm or less) covered the main pasture lands. During May, light, scattered showers frequently occurred across the main winter grain areas, resulting in near- to above-normal rainfall at many locations for the entire month. The moisture was beneficial for germination, but only partly corrected long-term moisture deficits in the southeast.

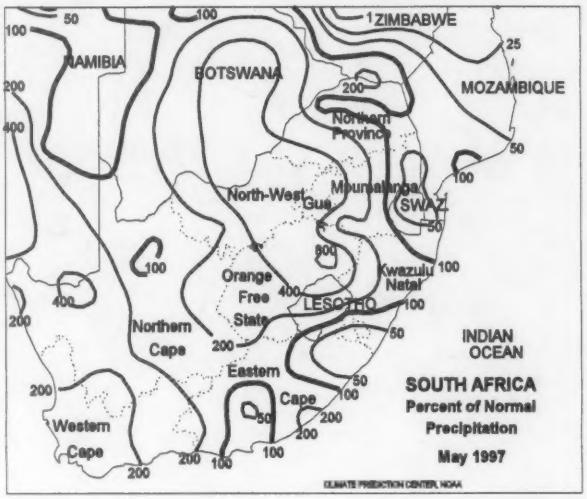


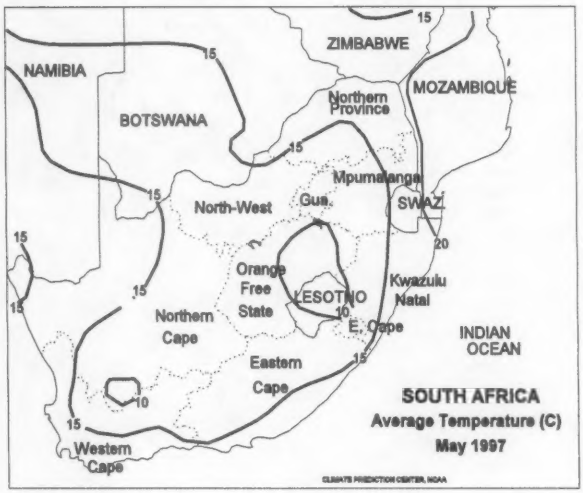







ZIMBABWE
BOTSWANA
NAMIBIA
MOZAMBIQUE
Northern Province
North-West
Mpumalanga
Gua.
SWAZ
Kwazulu Natal
Orange Free State
LESOTHO
E. Cape
Northern Cape
Eastern Cape
Western Cape
INDIAN OCEAN
SOUTH AFRICA
Total Precipitation(mm)
May 1997
CLIMATE PREDICTION CENTER, NOAA


ZIMBABWE
NAMIBIA
BOTSWANA
MOZAMBIQUE
Northern Province
North-West
Mpumalanga
Gua.
SWAZ
Kwazulu Natal
Orange Free State
LESOTHO
Northern Cape
Eastern Cape
Western Cape
INDIAN OCEAN
SOUTH AFRICA
Percent of Normal Precipitation
May 1997
CLIMATE PREDICTION CENTER, NOAA


ZIMBABWE
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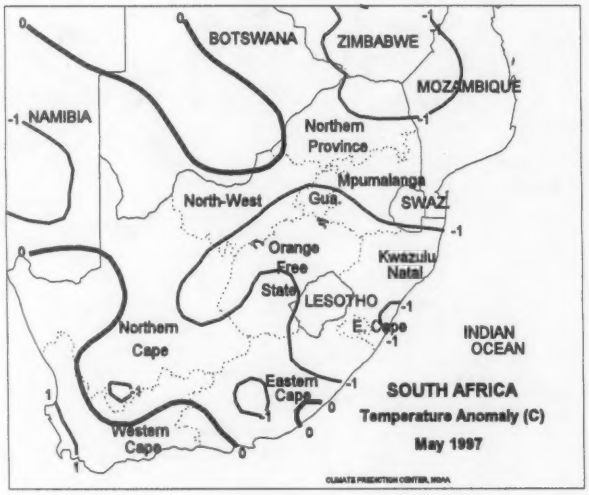
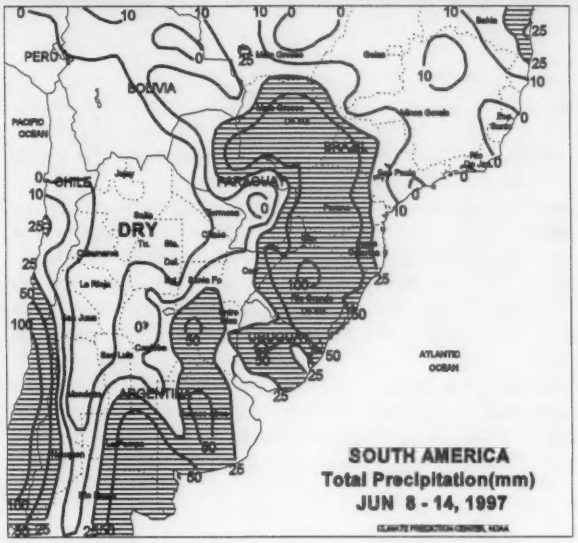
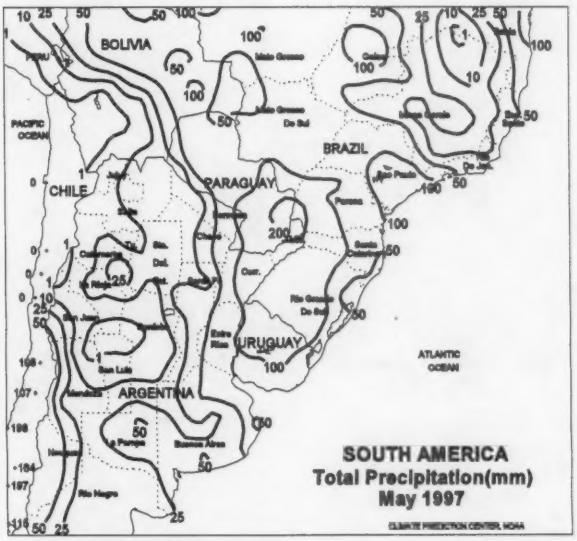
MOZAMBIQUE
Northern Province
North-West
Mpumalanga
Gua.
SWAZ
Kwazulu Natal
Orange Free State
LESOTHO
E. Cape
Northern Cape
Eastern Cape
Western Cape
INDIAN OCEAN
SOUTH AFRICA
Average Temperature (C)
May 1997
CLIMATE PREDICTION CENTER, NOAA

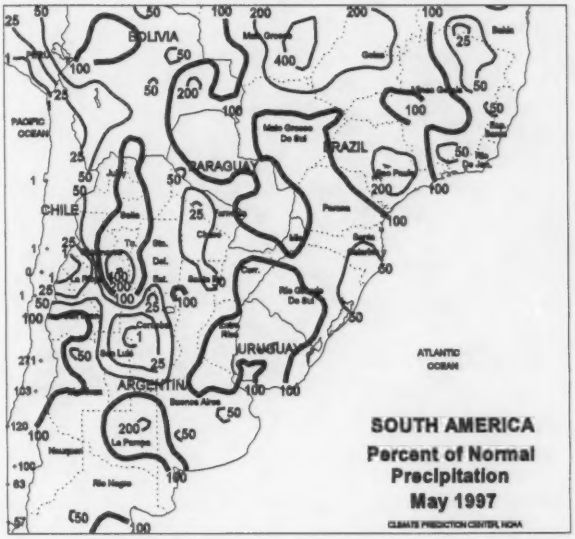

BOTSWANA
ZIMBABWE
NAMIBIA
MOZAMBIQUE
Northern Province
North-West
Mpumalanga
Gua.
SWAZ
Kwazulu Natal
Orange Free State
LESOTHO
E. Cape
Northern Cape
Eastern Cape
Western Cape
INDIAN OCEAN
SOUTH AFRICA
Temperature Anomaly (C)
May 1997
CLIMATE PREDICTION CENTER, NOAA

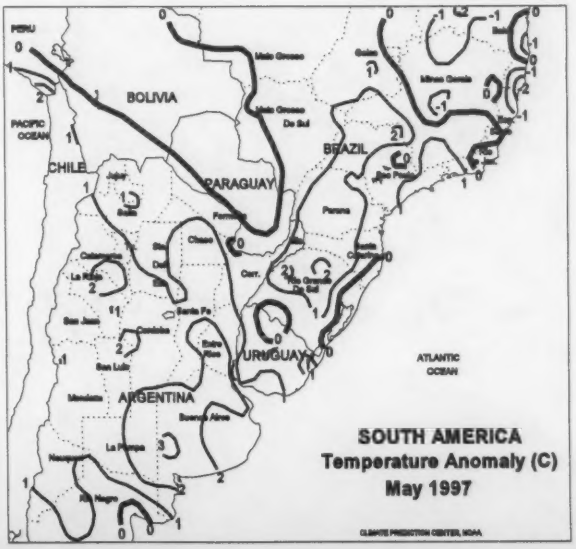


SOUTH AMERICA

Widespread rain (15-60 mm) again covered central Argentina and southern Brazil, boosting topsoil moisture for winter wheat planting. The moisture was especially welcome in the wheat areas of southeastern Brazil and Santa Fe and Cordoba, Argentina, which had been tending dry. According to reports from Argentina, as of June 6, 91 percent of the corn crop was harvested, 97 percent of soybeans, 93 percent of sorghum, 72 percent of cotton, and sunflower harvesting was complete. Early in the week, minimum temperatures ranged from 1 to 3 degrees C in southwestern Minas Gerais, causing little, if any, damage to coffee. During May, rainfall averaged 40 to 60 percent of normal across the major wheat areas of eastern Parana and Santa Catarina and northeastern Rio Grande do Sul. Southern Rio Grande do Sul and western Parana reported near- to above-normal rainfall. In central Argentina, near- to above-normal rainfall increased topsoil moisture for wheat planting. However, Cordoba received less than 25 percent of normal rainfall, delaying wheat planting.

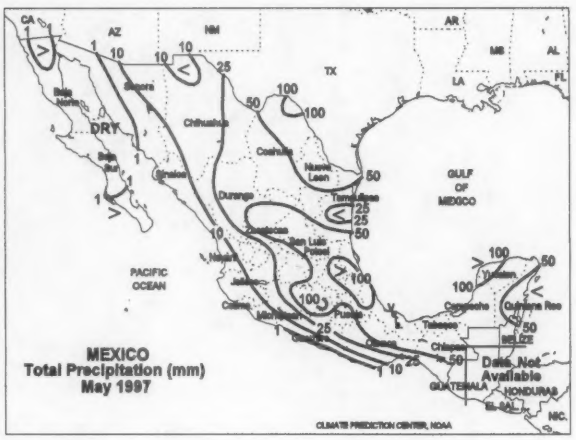


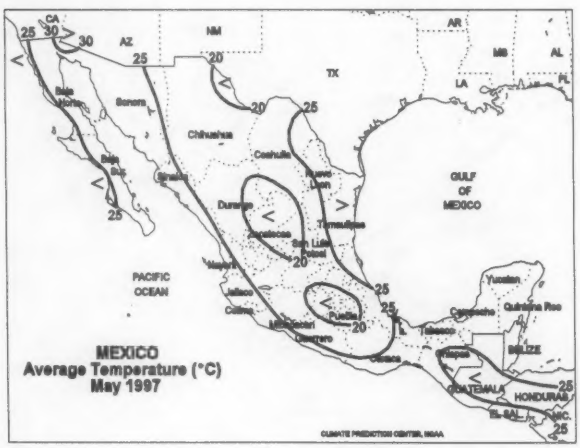


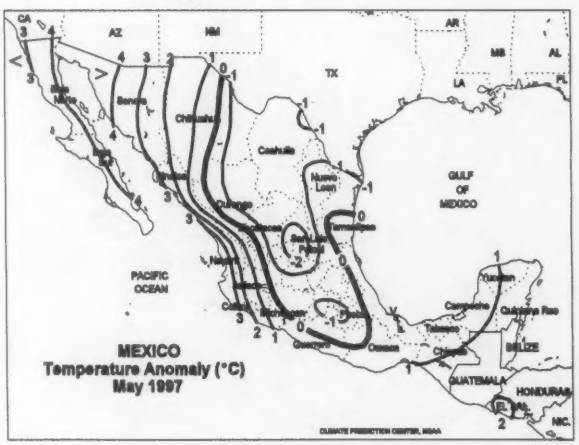


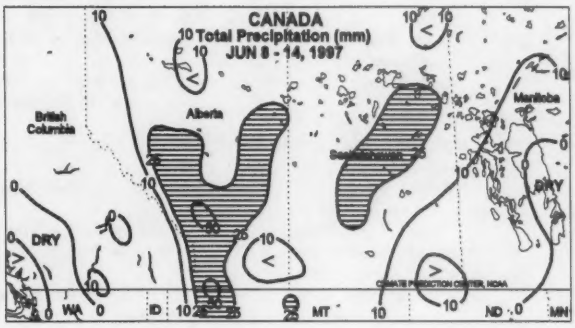
MEXICO

Seasonably light showers (5-20 mm) fell across the main corn belt, and above-normal temperatures (1-3 degrees above normal) continued to reduce moisture supplies for vegetative corn. Showers (10-45 mm) benefited pastures and increased irrigation supplies in north-central Mexico. Tropical Storm Blanca skirted the southern coast, providing only light to moderate showers (5-30 mm) to the Guerrero and Oaxaca states. Tropical showers (25-70 mm) blanketed Chiapas and the Yucatan Peninsula. During May, most of the country received near- to above-normal rainfall. Below-normal rainfall was reported in the extreme northeast, extreme northwest, and southern Mexico. Temperatures averaged 1 to 2 degrees C below normal across north-central and central Mexico and 2 to 4 degrees C above normal in the northwest. Rainfall during last autumn and this spring has increased end-of-May reservoir levels 10 to 25 percent higher than last year.



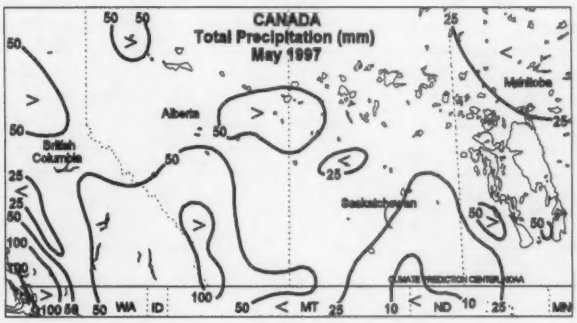


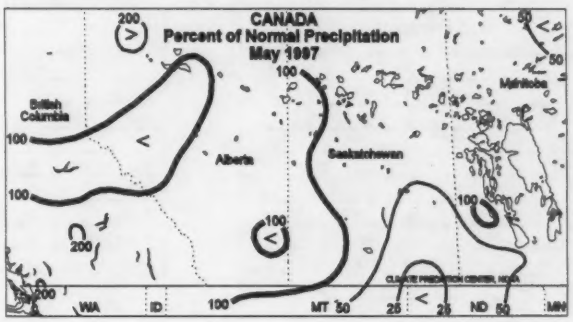


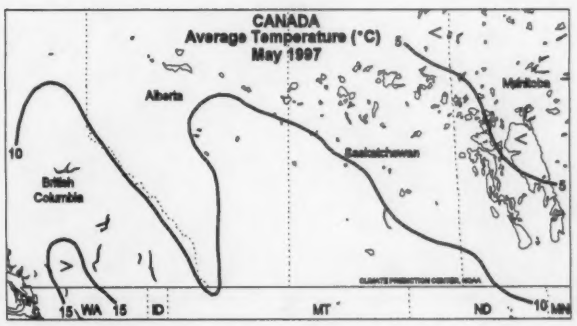


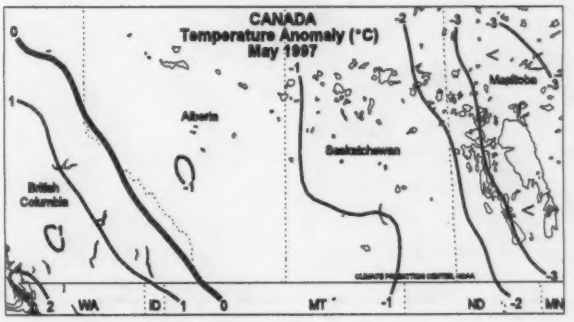
CANADA

A warm but wetter pattern brought widespread showers to Prairie grains and oilseeds. Rainfall totaled 10 to 25 mm or more over an expansive area that left just a few dry pockets in southern and easternmost crop areas. The rain kept a few spots in northern Alberta excessively wet but was welcomed in the southeast following a protracted drying trend. In Ontario, warmer, drier conditions favored winter wheat development and corn and soybean establishment. In May, cool weather caused only minor planting delays in Alberta and Saskatchewan, with excessive wetness hampering fieldwork in Alberta's northern agricultural districts. Persistent cold in Manitoba hampered fieldwork and early crop development, as did residual wetness from the Red River floods. In Ontario, unrelenting cool, showery weather hindered corn and soybean plantings and slowed germination. For winter wheat, conditions not only slowed development but threatened a resurgence in diseases that have plagued this region in recent years.









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(Continued from page 14)

Barley Crop Condition by Percent

	VP	P	F	G	EX
ID	1	1	7	56	35
MN	1	9	33	48	9
MT	1	3	27	49	20
ND	2	10	32	51	5
SD	0	0	9	70	21
WA	0	0	9	73	18
ALL	1	6	25	54	14
Prev Wk	1	5	23	58	13
Prev Yr	0	4	24	59	13

Spring Wheat Crop Condition by Percent

	VP	P	F	G	EX
ID	1	2	6	57	34
MN	2	13	28	40	17
MT	3	8	35	44	10
ND	3	13	30	49	5
SD	0	6	16	59	19
ALL	2	11	28	49	10
Prev Wk	0	6	25	58	11
Prev Yr	0	3	23	63	11

Rice Crop Condition by Percent

	VP	P	F	G	EX
AR	0	4	35	48	13
CA	0	0	10	80	10
LA	0	6	46	42	6
MS	0	3	27	66	4
TX	0	4	37	51	8
ALL	0	4	32	54	10
Prev Wk	0	3	33	50	14
Prev Yr	0	2	23	58	17

VP - Very Poor
P - Poor
F - Fair
G - Good
EX - Excellent

National crop conditions for selected States are weighted based on 1996 planted acres.

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